

# THE NATION'S SCHOOLS

## OCTOBER

*Give teachers a rest break*

*The changing superintendency*

*Teaching with a tape recorder*

*Blast resistant school for atomic age*

*Agrarian myth in administration*

*Pay increase won't eliminate poor teaching*

*Colors and courts make homelike school*

*Integration gains in border states*

*For substitutes, use your better teachers*

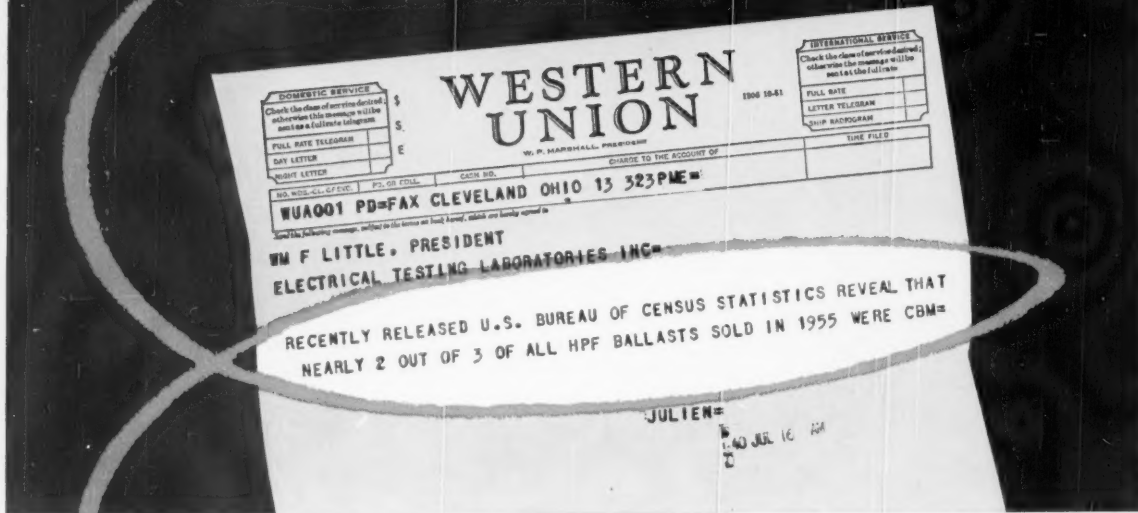


# CERTIFIED



# BALLASTS

## outsold other ballasts!



*Here are the reasons for this overwhelming preference:*

Experience shows that ballasts delivering improper electrical values to tubes may reduce lamp life by as much as 50% and light output as much as 30% below ratings.

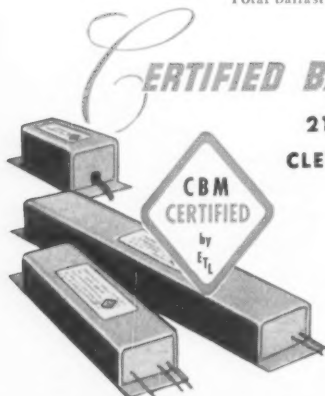
To prevent such losses and to provide every possible safeguard, CERTIFIED CBM BALLASTS are made to exacting specifications that prescribe the correct electrical values to be delivered to the tube.

And to assure conformity to these specifications, Electrical Testing Laboratories, Inc., regularly tests samples of factory production.

That's why nearly 2 out of 3 HPF ballasts\* carry the famous CBM emblem. With CERTIFIED CBM BALLASTS you're assured:

LONG BALLAST LIFE    RATED LAMP LIFE  
RATED LIGHT OUTPUT    TROUBLE-FREE OPERATION  
FREEDOM FROM NOISE

\*Total ballast sales from U. S. Dept. of Commerce. CERTIFIED CBM BALLAST sales from ETL reports.



**2116 KEITH BLDG.,  
CLEVELAND 15, OHIO**

Seven of the country's leading manufacturers of ballasts make CERTIFIED CBM BALLASTS. Participation in CBM is open to any manufacturer who wishes to qualify.

Send for free booklet, "Why It Pays to Use CERTIFIED CBM BALLASTS in Fluorescent Lighting Fixtures".



CERTIFIED BALLAST MANUFACTURERS • 2116 Keith Building • Cleveland 15, Ohio

NAME \_\_\_\_\_

ADDRESS \_\_\_\_\_

CITY \_\_\_\_\_ STATE \_\_\_\_\_



THE VAST MAJORITY OF THE NATION'S FINE BUILDINGS ARE SLOAN EQUIPPED

GEORGE L. DAHL  
architect & engineer  
R. P. FARNSWORTH & CO.  
general contractor  
C. WALLACE PLUMBING CO.  
plumbing contractor  
SOUTHLAND SUPPLY CO.  
plumbing wholesaler



## DALLAS TO BE HOST TO MULTITUDES

• Culminating many years of planning, Dallas, Texas, can soon provide convention facilities which will have few rivals. They will also accommodate local events of many kinds. Its new, spectacular Memorial Auditorium will be in two major sections. The largest unit will be the circular, domed arena which will seat 7600 persons in permanent seats, plus 2400 in portable seats on the arena floor, all of them facing a removable stage. Acoustical control is effected by a sus-

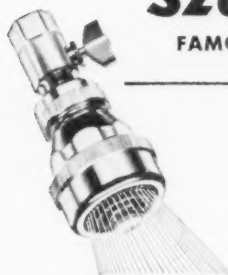
pended ceiling which also supports the heating, cooling and lighting systems. There are no columns to obstruct the view. A connecting unit contains a theatre seating 2000, a large foyer and ten meeting rooms which can seat from 40 to 300 persons. Below the major units is over 90,000 square feet of exhibition space. The specifying of SLOAN Flush VALVES for these buildings, where multitudes will gather, is assurance of efficiency, durability and economy.

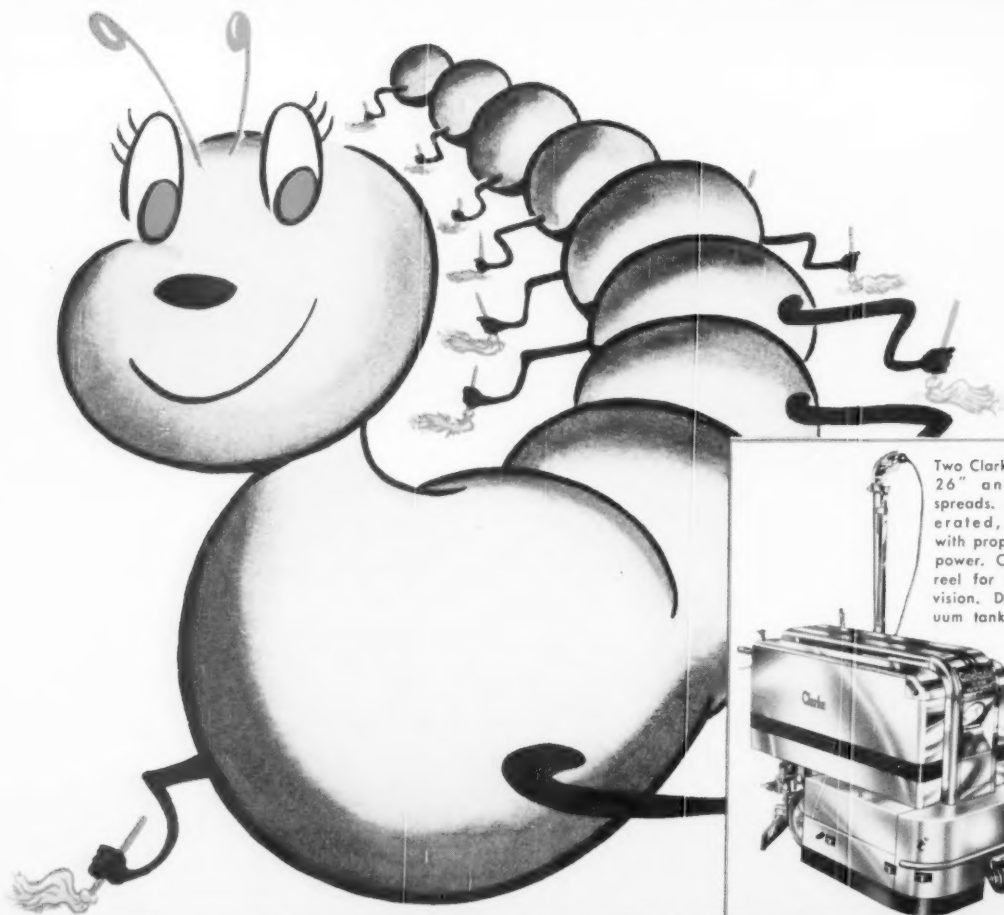
### **SLOAN** *Flush* **VALVES** FAMOUS FOR EFFICIENCY, DURABILITY, ECONOMY

SLOAN VALVE COMPANY • CHICAGO • ILLINOIS

Another achievement in efficiency, endurance and economy is the SLOAN Act-O-Matic SHOWER HEAD, which is automatically self-cleaning each time it is used! No clogging. No dripping. Architects specify, and Wholesalers and Master Plumbers recommend the Act-O-Matic—the better shower head for better bathing.

Write for completely descriptive folder





Two Clarke-A-matic sizes, 26" and 30" brush spreads. Electrically operated, also available with propane or gasoline power. Concealed cable reel for clear operating vision. Double size vacuum tank.

## UP TO 20 TIMES FASTER THAN MOPPING — WITH **ClarkeA-matic**

No, you can't hire a man-size centipede to swing 20 mops at once. But you *can* get a Clarke-A-matic Floor Maintainer and have *one* man do the work of up to 20. This revolutionary two-speed, self-propelled maintainer automatically meters solution to its twin brushes, scrubs, rinses, picks up dirt and solution, and dries — all in one easy operation. It handles *all* your floor maintenance easily, quickly, thoroughly . . . and slashes maintenance costs by saving time and labor. Clean large floor areas in record time — up to 28,200 sq. ft. per hour. Ask your Clarke distributor to demonstrate.

Clarke Floor Maintainer has interchangeable attachments for eight floor jobs—scrub, wax, polish, steel wool, buff, grind, disc sand, sham-poo. Seven sizes.



Clarke Wet-Dry-Vacuum Cleaner has powerful suction for picking up liquid, suds, dust, dirt. Cleans everything from floor to ceiling — even furnace boilers. Six models.

# Clarke

## SANDING MACHINE CO.

5010 CLAY AVENUE • MUSKEGON, MICHIGAN



Distributed in Canada: G. H. Wood & Co., Ltd., P.O. Box 34, Toronto 14, Ont.  
Authorized Sales Representatives and Service Branches in Principal Cities

VOLUME 58, NO. 4

Editorial Director  
R. M. CUNNINGHAM Jr.

Editor  
ARTHUR H. RICE

Assistant Editors  
MILDRED WHITCOMB  
MARY TOMANCIK  
DOLORES HENNING

Editorial Assistant  
JEAN VON CHRISTIERSON

Art Director  
EWALD L. WEBER

Publisher  
RAYMOND P. SLOAN

Associate Publisher  
STANLEY R. CLAGUE

Advertising Director  
J. W. CANNON Jr.

Editorial and  
Publishing Offices  
919 N. MICHIGAN AVE.  
CHICAGO 11, ILL.

Eastern Office  
101 PARK AVE.  
NEW YORK 17, N.Y.

Cleveland  
Advertising Office  
19030 WESTLAKE ROAD  
CLEVELAND 16, OHIO

Western States  
Advertising Representative  
McDONALD-THOMPSON  
LOS ANGELES, SAN FRANCISCO  
DALLAS, SEATTLE, HOUSTON  
DENVER



Published monthly and copyright © 1956 by The Nation's Schools Division, The Modern Hospital Publishing Co., Inc., 919 North Michigan, Chicago 11, Ill., U.S.A. Raymond P. Sloan, president; Stanley R. Clague, vice president and secretary; Everett W. Jones, vice president; Peter Ball, vice president; John P. McDermott, treasurer. Subscriptions, 1 year, \$4; 2 years, \$6. Outside U.S., U.S.P., Canada, 1 year, \$6; 2 years, \$10. Current copies, 50c each. Member, Audit Bureau of Circulations; Magazine Publishers' Association; Educational Press Association of America; Microfilms, University Microfilms, 313 N. First St., Ann Arbor, Mich. Entered as second-class matter Jan. 16, 1928, at the Post Office at Chicago, Ill., under the Act of March 3, 1879. Published on the 20th of the month preceding the date of issue. Allow 30 days in advance of publication date for change of address.

# THE NATION'S SCHOOLS

THE MAGAZINE OF BETTER SCHOOL ADMINISTRATION

OCTOBER 1956

## ARTICLES

Forms of Compliance to Desegregation Decision.....	43
GLEN ROBINSON	
For Substitutes, Use Your Better Teachers.....	51
JAMES G. HARLOW and JOHN H. M. ANDREWS	
Summer Workshop for Children.....	53
An Interview With RAYMOND J. NAEGELE by DOLORES E. HENNING	
Rest Break for Teachers Highly Favored.....	57
OPINION POLL	
The Changing Superintendency.....	58
WORTH McCLURE	
Look for the Source of Misunderstandings.....	60
GUY CHAPMAN	
Authority Over Education Is Shifting to Central Government.....	61
I. NEWTON EDWARDS	
Jumping to Conclusions on Statistical Data.....	77
FRANCIS G. CORNELL	
The Agrarian Myth in Administration.....	80
JOHN A. BARTKY	
Salary Schedules Are a Compromise With Ignorance.....	81
FREDERICK L. REDEFER	
Chalk Dust.....	83
FREDERICK J. MOFFITT	
A.A.S.A. Theme: Schools on the Threshold of a New Era.....	84
PAUL J. MISNER	
A Parent's Report on a Parent Conference.....	86
LESTER J. GRANT	

## SCHOOLHOUSE PLANNING

Color, Courts and Child-Size Scale Make Homelike School.....	66
DWIGHT B. IRELAND	
Beverly School Fulfills "Three E's" of Function.....	71
EBERLE M. SMITH	
Blast Resistant School.....	73
An Interview With HARVEY P. SMITH by LEWIS C. FAY	

## AUDIO-VISUAL: The Tape Recorder

Breaks Barriers.....	88
ALEXANDER FRAZIER	
Repeats History.....	89
OPAL ROSSON	
Saves Time and Teachers.....	90
FRANK B. GEORGE	
Teaches Agriculture.....	92
RICHARD KRAEMER	

## BUSINESS ADMINISTRATION

Legal Authority for Paying Dues From School District Funds.....	94
JOE V. McCLAIN	

## THE SCHOOL LUNCH

Authority of School Districts to Operate Lunchrooms.....	100
LEE O. GARBER	

## REGULAR FEATURES

Among the Authors.....	4
Administrator's Clinic.....	6
Questions and Answers.....	8
Reader Opinion.....	10
Roving Reporter.....	12
Looking Forward.....	41
Wire From Washington.....	110
News in Review.....	120
About People.....	148
Coming Events.....	164
The Bookshelf.....	166
What's New for Schools.....	171
Index of Advertisers.....	op. 218



## AMONG THE AUTHORS

A solution to teacher absences is not substitute teachers, but reserve teachers. So say JAMES G. HARLOW and JOHN H. M. ANDREWS, co-authors of the discussion on page 51. Dr. Harlow, associate professor of education at the University of Chicago since 1954, began his professional career as science teacher and department head in Oklahoma public schools. After a four-year stint with the U.S. Naval Reserve, he was named to the department of physics and extension division, University of Oklahoma. Later he was appointed dean of the college of arts and sciences there. . . . Mr. Andrews, staff associate at the Midwest Administration Center, University of Chicago, was born and educated in British Columbia, where he started his teaching career and remained to become principal of an elementary-high school. He emigrated to the University of Chicago in 1955.

NEWTON EDWARDS answers the question: What is the extent of the federal government's power over public schools? Professor of education at the University of South Carolina, Dr. Edwards clarifies some questions on legal theory on page 61. Prior to his appointment to the University of South Carolina, Dr. Edwards taught at the University of Chicago, the University of California, and the University of Texas. He is a past president of the American Educational Research Association. In 1946 he was named consultant to the President's Commission on Higher Education, serving one year in that post.



Joe V. McClain

The fuzziness of legal authority in many school districts may have caused some boards to spend funds illegally for membership dues. JOE V. MCCLAIN, assistant superintendent in charge of educational services for Ranchito School District, Pico, Calif., studied and analyzed this problem and reports his findings on page 94. Dr. McClain, the son of a Tennessee sharecropper, was graduated from elementary and high school in Kentucky and received his bachelor's and master's degrees from Whittier College, Whittier, Calif. He took his doctorate work in education at the University of Southern California, Los Angeles. After three years as an elementary teacher at Santa Ana, Calif., he was appointed elementary school principal there. He was named to his present position in July of this year. Dr. McClain is also a part-time staff member of Long Beach State College, Long Beach, Calif.

"City slickers" who have the idea that city schools can be run with the same folksy attitude that pervades rural schools are taken to task on page 80 by JOHN A. BARTKY. Dr. Bartky, professor of education at Stanford University, Stan-

ford, Calif., punctures the "agrarian myth" and recommends a representative form of control. Dr. Bartky, now on leave from Stanford while serving as director of the New York Public Education Association, spent the first 45 years of his life in Chicago, where he began his teaching career in 1921 as assistant professor of engineering and mathematics at the Illinois Institute of Technology. After serving as elementary school principal and district superintendent of several Chicago schools, Dr. Bartky assumed the presidency of Chicago Teachers College. From 1946 to 1953 he served as the dean of Stanford University's school of education.

If teachers don't know how a new device is to be used or what it is for, they're not going to use it, declares ALEXANDER FRAZIER. Mr. Frazier, assistant superintendent in charge of curriculum and instruction for the public schools in Houston, Tex., uses the tape recorder as a case in point in his article beginning on page 88.



Alexander Frazier

Before going to the Houston schools, Mr. Frazier spent two years in Los Angeles as curriculum coordinator for the Los Angeles County schools. Prior to his California work, he served as curriculum consultant for the secondary schools in Phoenix, Ariz. . . . Eighth grade pupils in a Houston junior high school saw history in a different light when they recorded it, reports OPAL THOMSON ROSSON, social studies teacher and audio-visual coordinator for the Pershing Junior High School. Mrs. Rosson has taught in Texas schools for 34 years. . . . Contributing to this coordinated series on tape recording are FRANK B. GEORGE, supervisor of radio-TV education of the unified school district, Long Beach, Calif., and RICHARD KRAEMER, department of vocational education at Iowa State College, Ames.

What keeps alive that initial spark of enthusiasm and devotion with which most teachers begin their careers? And what makes a good teacher grow into a better teacher? We need to answer these questions by a critical examination of school personnel policies, says FREDERICK L. REDEFER (p. 81). Dr. Redefer has been professor of education at New York University since 1947. For more than 10 years, he was director of the Progressive Education Association; then he became associated with the education and training section of the Veterans Administration. He has directed several international conferences under the auspices of the U.S. government; in 1943 the Office of War Information sent him to England to lecture on American education. He began his career in education as a teacher in Pennsylvania, later serving successively as assistant superintendent and superintendent at Glencoe, Ill.



Typical classroom in the John B. Schaffner School, Louisville, Kentucky, showing installation of Acousti-Celotex Cavity Tile, a new material incorporating a unique acoustical principle. Application shown on Celotex "T & T" Suspension System. Acousti-Celotex Contractor: E. C. Decker & Co. of Kentucky, Inc.

## *NEW* Acousti-Celotex Cavity Tile . . . Effective...Attractive...Brings QUIET, Adds Beauty to Schoolrooms



The Acousti-Celotex Sound Conditioning installation in Louisville's John B. Schaffner School combines extreme effectiveness with unusual eye-appeal. It consists of new Acousti-Celotex Cavity Tile on Celotex "T & T" Suspension System, providing high sound-absorption value and incombustibility with economy and simplicity. Utilizes 12" x 24" white finish panels which may be washed *repeatedly* and painted *repeatedly* without loss of sound-absorbing properties.

**Easily Maintained**—A sound-absorbing ceiling of Acousti-Celotex Tile arrests disturbing noises in classrooms, corridors, libraries, study halls, auditoriums, gymnasiums. The *quiet comfort* it brings aids efficiency and morale of students and teachers. These ceilings are quickly installed in existing buildings or during new construction and need no special maintenance thereafter.

**This Costs You Nothing**—You do not pay one cent for the most important part of Acousti-Celotex Sound Conditioning—*30 years of sound engineering experience . . .* in acoustical installations of all types, under all conditions. **Mail Coupon Now** for a Sound Conditioning Survey Chart that will bring you a *free analysis* of the noise and acoustical problems in your school, plus a free factual booklet, "Sound Conditioning for Schools and Colleges." No obligation.

**ACOUSTI-CELOTEX**  
REGISTERED U. S. PAT. OFF.  
*Sound Conditioning*



\*TRADE MARK

*Mail Today!*

The Celotex Corporation, Dept. M-106  
120 S. LaSalle St., Chicago 3, Illinois

Without cost or obligation, please send me the Acousti-Celotex Sound Conditioning Survey Chart, and your booklet, "Sound Conditioning for Schools and Colleges."

Name  Title

Address

City  Zone  State

Products for Every Sound Conditioning Problem—The Celotex Corporation, 120 S. LaSalle Street, Chicago 3, Ill. • In Canada: Dominion Sound Equipments, Ltd., Montreal, Quebec.

**Academic ranking for classroom teachers . . . Naïve or dishonest? . . . Too many interruptions of work**

By CALVIN GRIEDER, professor of school administration, University of Colorado

**N.A.M.'s exhortation is naïve or dishonest.** Recently the National Association of Manufacturers, in an open letter to its 21,000 members, urged businessmen "to spearhead a nationwide drive to help school systems obtain locally the funds they need to meet all legitimate requirements." It emphasized that school needs "can and should be met at the local level."

For its expressed interest in lifting the level of school support the N.A.M. certainly deserves commendation. Cola G. Parker, its president, declared: "Where there is a shortage of classrooms, more schools must be built immediately; teachers are underpaid, and there are not enough of them; school officials and administrators deserve the recognition and financial rewards commensurate with their responsibilities." He solicited the cooperation of businessmen in raising standards of public education and their cooperation with local school boards in efforts to obtain adequate budgets.

Along with these fine exhortations, Mr. Parker also took a few shots at federal aid, which, in company with the U.S. Chamber of Commerce, the N.A.M. regards as anathema—in spite of the ponderous evidence which demonstrates the need for federal aid.

But in their almost pathological abhorrence of federal aid, these two organizations, in emphasizing local support, consistently ignore the important subject of state support. The spokesmen for American business may know business, but they surely do not know the facts of school finance.

It has been powerfully shown by numberless studies that in many communities local school support is inadequate and cannot be made adequate. The N.A.M.'s insistence on local support is grossly naïve or dishonest or both. If it would exert itself in behalf of generous state and local sup-

port as hard as it does fighting federal aid, its position would be somewhat more tenable.

School administrators and board members should not let themselves be duped by the N.A.M. and the Chamber of Commerce. These two organizations have no monopoly on fear of federal control, which is back of their opposition to federal aid. To all administrators and board members, federal control of public education is just as hateful as it is to them. Aid is possible without control, by various means.

The main point here, however, is that the N.A.M.'s advocacy of local support alone is unrealistic and its overemphasis is likely to be a handicap in developing good state programs.

**Academic ranking for classroom teachers.** I think there is merit in the idea of academic ranking for classroom teachers. A few school systems do now have a scheme resembling this, e.g. Glencoe, Ill., with its probationary, professional and career designations. I believe that four ranks would be just as suitable in schools as in colleges, and the four titles I submit are (1) provisional teacher, (2) instructor, (3) senior instructor, and (4) professional teacher. The provisional rank would ordinarily span the years of probationary status.

To pass from one rank to another a teacher would be expected to satisfy criteria developed in each school system. Substantial salary increases would accompany promotion in rank, besides smaller annual increments within each bracket.

There is no magic in this, of course. The establishment of criteria and their application would be made no easier than now, but the recognition of merit would be made more tangible and perhaps more systematic.

The administration of academic ranks in higher education is not as well done as a lot of people think. Criteria used in recommendations for promotion and merit increases are difficult to apply. The assessment of a professor's performance is full of pitfalls. But the plan is almost universal in this country (and in many others with different terminology) and works well enough so that it is not likely to be given up.

As a member of a committee at my university which is wrestling with the assignment of sharpening up criteria for promotion and evaluation of individual merit, I can say that the academic rank system looks better on paper than in practice. Its principle is okay, though, and practice is improving. The plan could readily be adapted to public school teaching.

**Too much interference with scheduled classwork.** With the school activity program in full swing, high school teachers (and students too?) are again harassed by endless interruptions of classroom work. Two leading forms of these afflictions are (1) ill timed announcements over the public address system and (2) excusing students from class for a variety of rehearsals, preparations for special programs, parties, athletics and so on.

In a well managed school, announcements over the public address system are scheduled for definite times once or twice a day. There is no excuse, except in an emergency, for flicking on the switch whenever the spirit moves the principal.

On the other point, excusing students from class is a practice that should be thoroughly reviewed. If principals, teachers, coaches and sponsors place a higher value on activities than on instruction, how can they expect students to do otherwise? The "serious work" of the schools is placed at a great disadvantage when for almost any reasons, usually flimsy, students are excused.

Providing time during the school day for a diversified activity program is not simple, at best. In schools where a considerable number of students are transported it is a most troublesome problem. The easy way out is to cram everything into an already too short school day and allow students time from their classes to participate in activities.

A more intelligent approach would be to analyze the whole situation with





Science Building, Western Illinois State College, Macomb, Illinois

Architects: Hewitt & Bastian

Contractor: Tunncliff Construction Company

Equipped with Adlake Reversible Windows

## Another **Adlake** aluminum window installation



- Minimum air infiltration
- Finger-tip control
- No painting or maintenance
- No warp, rot, rattle, stick or swell
- Guaranteed non-metallic weatherstripping (patented serrated guides on double hung windows)

**The Adams & Westlake Company**

Established 1857 • Elkhart, Indiana • Chicago • New York



## Administrator's Clinic, Cont.

a proper perspective on values of school studies and activities. In many schools the day might well be lengthened. Why should high school boys and girls get out at 2:30 or 3 o'clock? In others, only so much should be attempted as can be done within the regular hours of school, which may mean some telescoping and de-emphasizing of some activities. At any rate the academic work ought not to be made the victim of the activity program.

The term "extracurricular" has been partly supplanted by "cocurricular," and the reasoning behind this change is laudable. Yet "extracurricular activities," in the sense that activities are carried on outside regular class time, is still a good phrase, in my book.

## Questions and Answers

### Disinfecting Schoolrooms

What are some ways of disinfecting and deodorizing schoolrooms

and also of controlling insects and rodents?

Custodians in Seattle schools follow these instructions, as published in our "Custodian's Manual":

*"Use of Disinfectants and Deodorants.* (a) The source of infection is the individual. So long as an infected individual is present in a room, any disinfectants that might be used on the walls or floor would have little, if any, value in preventing infection. Cleanliness ordinarily will take care of the problem of infection without resort to strong disinfectants.

"(b) Soap and water are the best agents for cleaning, together with plenty of fresh air.

"(c) In case of lavatories, urinals and toilet bowls, many of the so-called germicides in reality accomplish nothing except to cover up the primary odor with the stronger odor of the chemical used. Those that are deodorant, such as sodium hypochlorite, may be used to advantage.

"For cleaning and deodorizing floors, toilets, urinals, tumbling mats, and the like, use one tablespoon of sodium hypochlorite, 10 per cent solution, to each gallon of water. For foot-bath, use one pint to two gallons of water.

"In cases of vomiting, sodium hypochlorite solution is effective in mopping up after sick pupils in the classroom. It not only disinfects, but immediately neutralizes the odor. The latter is particularly important in keeping other students from becoming nauseated."

Our custodian's bulletin for March, 1948, said:

*"Eradication of Roaches.* By experimentation, Chlorodane has proved to be highly satisfactory in the eradication of roaches. Although Chlorodane formulations possess toxicities of lower order, contamination of food should be avoided. In case of spillage on the skin, washing with soap and water is recommended. Chlorodane should be sprayed in infested areas only. The best way to gauge proper amount of Chlorodane (of 2 per cent formulations) is to spray until surfaces are wet. It may be applied with a regular Hudson sprayer. We instruct our custodians to order in one gallon quantities.

*"Rodent Control.* The Seattle public schools have been successful in holding rat and mice infestation to a minimum. We have been highly pleased by the use of a material dis-

**YOUR SUPER DEALER...**

**THE Outstanding SUPPLIER**

**OF FLOOR MAINTENANCE EQUIPMENT Today**



**Super Floor Machines** scrub, polish, buff, sand, steel wool, grind, scour all types of floor surfaces. Specialized tool equipment is provided to fully meet industrial and other special requirements.

**Ask him! Your Super dealer can help you solve any floor maintenance problem, complicated or simple, extensive or limited. The many models of the ultra modern Super Suction® Heavy Duty Cleaners and the Super Service® Floor Machines—all with Super Specialized tool equipment—make them the first choice in every classification in the commercial floor maintenance field, regardless of budget or capacity requirements.**



**Super Model BP-2.** The most modern, big capacity, heavy duty, wet and dry suction cleaner. Extremely quiet. By-pass motor, "Push button" hose connection. Special blowing outlet. Extra large fixed rear wheels. Two ball bearing front casters and many other exclusive Super features.

**SUPER SUCTION® CLEANERS**

Seven models. Wet and dry pick-up and blowing. Internal, uncloggable filter. Dry air by-pass. Specialized tool equipment for all kinds of work.

**SUPER SERVICE® FLOOR MACHINES**

4 Sizes—13", 15", 17", 20". Easy-rest switch eliminates grip effort and hand fatigue. Smooth starting. Simple design and rugged construction—no service problems. Oversize, non-marking rubber wheels make transportation easy, even on stairs.

**Super Model BP-2.** The most modern, big capacity, heavy duty, wet and dry suction cleaner. Extremely quiet. By-pass motor, "Push button" hose connection. Special blowing outlet. Extra large fixed rear wheels. Two ball bearing front casters and many other exclusive Super features.

**THE NATIONAL SUPER SERVICE COMPANY**

1956 N. 13th St. TOLEDO 2, OHIO

SALES AND SERVICE in Principal Cities

IN CANADA: Plant Maintenance Equipment Company  
TORONTO  
MONTREAL  
VANCOUVER

**"Once Over Does It"**

**SUPER SUCTION®**

**Power Suction Cleaners • Quality Floor Machines**

**"THE DRAFT HORSE OF BUILDING MAINTENANCE MACHINES"**



## There's safety in the shine if there's Du Pont Ludox® in the wax

Quick work, Miss Jones—the boss is waiting! Safer work, too, because that gleaming floor wax contains “Ludox” colloidal silica . . . Du Pont’s anti-slip ingredient.

In more and more offices, hospitals, schools and churches, the unique “snubbing” action of “Ludox” is reducing skidding and slipping. This action occurs when the pressure of a footstep forces the hard, transparent “Ludox” particles

into the softer wax . . . absorbing the foot’s forward-moving energy. The result: added traction and safety underfoot.

What’s more, high-grade waxes, properly formulated with “Ludox,” retain all their basic properties: gloss, water resistance and leveling. Have your maintenance man insist on a floor wax containing “Ludox.” You’ll see that beautiful floors can be safer floors, too.



BETTER THINGS FOR BETTER LIVING  
... THROUGH CHEMISTRY

For safety underfoot, specify floor waxes made with

# LUDOX®

Colloidal Silica



# THE NATION'S SCHOOLS

## EDITORIAL CONSULTANTS

### ADMINISTRATION

JOHN GUY FOWLKES ..... *University of Wisconsin*  
 CALVIN GRIEDER ..... *University of Colorado*  
 JAMES M. SPINNING ..... *Rochester, N.Y.*  
 HERMAN L. SHIBLER ..... *Indianapolis Public Schools*

### FINANCE

ARVID J. BURKE ..... *New York State Teachers Assn.*  
 ERNEST G. LAKE ..... *Racine Public Schools*

### INSTRUCTION

WILLARD E. GOSLIN ..... *George Peabody College*  
 F. DEAN MCCLUSKY ..... *University of Calif., L.A.*

### PERSONNEL

C. C. TRILLINGHAM ..... *Los Angeles County Schools*  
 K. E. OBERHOLTZER ..... *Denver Public Schools*

### RURAL SCHOOLS

JULIAN E. BUTTERWORTH ..... *Ithaca, N.Y.*  
 M. L. CUSHMAN ..... *University of North Dakota*

### STATE ADMINISTRATION

F. J. MOFFITT ..... *Albany, N.Y.*

### INTERPRETATION

HEROLD C. HUNT ..... *U.S. Dept. of H.E.W.*  
 PAUL J. MISNER ..... *Glencoe Public Schools*

### SCHOOL LAW

LEE O. GARBER ..... *University of Pennsylvania*

### SCHOOL LUNCH

MARY DEGARMO BRYAN ..... *Columbia University*

### SCHOOL PLANT

RAY L. HAMON ..... *U.S. Office of Education*  
 JOHN H. HERRICK ..... *Ohio State University*  
 THOMAS J. HIGGINS ..... *Chicago Public Schools*

### BUSINESS ADMINISTRATION

B. R. OOSTING ..... *Hinsdale Public Schools*  
 FRANCIS R. SCHERER ..... *Rochester Public Schools*  
 JOHN W. LEWIS ..... *Baltimore Public Schools*

### AUDIO-VISUAL

WALTER A. WITTICH ..... *University of Wisconsin*

### HIGHER EDUCATION

W. W. HAGGARD ..... *W. Wash. Coll. of Ed.*  
 DAVID D. HENRY ..... *University of Illinois*

## EDITORIAL ADVISORY BOARD

HOMER W. ANDERSON ..... *Lakeland, Fla.*  
 L. FRAZER BANKS ..... *Birmingham Public Schools*  
 S. M. BROWNELL ..... *Detroit Public Schools*  
 FRANCIS S. CHASE ..... *University of Chicago*  
 HOBART M. CORNING ..... *District of Columbia*  
 C. L. CRAWFORD ..... *Mankato Teachers College*  
 NED H. DEARBORN ..... *National Safety Council*  
 E. A. DENNARD ..... *Waco Public Schools*  
 EARL A. DIMMICK ..... *Pittsburgh Public Schools*  
 JOHN R. EMENS ..... *Ball State Teachers College*  
 FINIS E. ENGLEMAN ..... *Exec. Sec'y., A.A.S.A.*  
 MARTIN W. ESSEX ..... *Akron Public Schools*  
 L. C. HALBERSTADT ..... *Terre Haute Public Schools*  
 F. G. HOCHWALT ..... *Nat. Catholic Welfare Confer.*  
 SCHUYLER C. JOYNER ..... *Los Angeles Public Schools*

H. M. KALLEN ..... *New School for Social Research*  
 JAMES D. MACCONNELL ..... *Stanford University*  
 HOLLIS A. MOORE Sr. .... *Tyler Public Schools*  
 P. M. MUIR ..... *Toronto, Ont.*  
 JAMES F. REDMOND ..... *New Orleans Public Schools*  
 W. C. REUSSER ..... *University of Wyoming*  
 PAUL W. SEAGERS ..... *Indiana University*  
 HAROLD SPEARS ..... *San Francisco Public Schools*  
 LINDLEY J. STILES ..... *University of Wisconsin*  
 W. W. THEISEN ..... *Milwaukee Public Schools*  
 EDMUND H. THORNE ..... *West Hartford Schools*  
 PAUL D. WEST ..... *Fulton County Schools*  
 W. T. WHITE ..... *Dallas Public Schools*  
 H. I. WILLETT ..... *Richmond Public Schools*  
 BENJAMIN C. WILLIS ..... *Chicago Public Schools*

covered in the past two years by the name of Warfarin. This material may be laid out in runways of mice and rats and near a place where the rodents will drink water after eating it."

"Warfarin" and "Chlorodane" are not trade names, but rather chemical terms. These are very common with chemists and the descriptions can easily be obtained.—JAMES L. STOCKS, *director of operations, public schools, Seattle.*

## READER OPINION

### Get at Cause of Problem; Corporal Punishment Won't Help

I was very much interested in the article in the July issue of *THE NATION'S SCHOOLS* ("Most Superintendents Favor the Use of Corporal Punishment," p. 57) in which it was reported that, according to a nationwide survey, most public school superintendents favor the administering of corporal punishment to youngsters (presumably that punishment which is applied to the conspicuous muscle of the human anatomy known as the *gluteus maximus*).

Such widespread sanction of corporal punishment among educational administrators did not come as a great surprise to me, as I have long suspected and observed that corporal punishment is commonly applied in many of our schools.

I, personally, have many serious objections to such methods of discipline because I believe in getting at the cause of the problem, rather than resorting to the temporary expediency of administering corporal punishment to the errant youngster.—DANIEL TANNER, *consultant in school-community development, Southern Illinois University, Carbondale, Ill.*

**Observer at an Auction.** As the last one-room schoolhouse in Clinton Township, New Jersey, was sold by an auctioneer to a local farmer for \$4100, Hanna A. Connolly watched and recalled her rôle as teacher there from 1894 to 1899. Miss Connolly said that she had had the largest class for miles around—40 pupils in kindergarten to eighth grade—which accounted for her somewhat higher than average salary, \$40 a month.

*in a class by itself . . .*



## **Burroughs Itemizing Cash Register gives you a locked-in audit tape of every cafeteria transaction... clearly labeled!**

*Here's the truly low-cost cash register with all the automatic and protection features you need to make your cafeteria operation smooth as clockwork. Take that audit tape, for instance. It tells you and Uncle Sam exactly which amount was collected for a subsidized student lunch, a sandwich from the snack bar, an adult lunch. And it's all done automatically!*

As your cashier prepares an itemized, descriptive receipt for each student and adult, the Burroughs automatically repeats the entire transaction on the audit tape. The end result: you get a detailed, coded record—with no additional effort—of the money you collect for every lunch and snack. The figures you need for governmental reports are automatically prepared for you.

In all other ways, too, your Burroughs is the last word in automation. It features the famous short-cut keyboard for fast, accurate check-out accounting . . .

there's no waiting for slow-up machine operations. When you take a total, the cash drawer pops open and the receipt automatically spaces for removal. Turn a key, and your Burroughs automatically converts to an adding machine for miscellaneous figuring work. Burroughs cash registers are available in both hand and electric models.

Reason enough to put a Burroughs to work in your cafeteria? If not, one demonstration will certainly convince you! Call our nearest branch office, or write: Burroughs Corporation, Detroit 32, Michigan.

*Wherever There's Business There's*



"Burroughs" is a trademark

# ROVING REPORTER

**Multi-Racial School Succeeds in Kenya • Junior High Pupils Need**

**Help in Growing Up • Canadian Youngsters Plant Vegetable Gardens**

IN KENYA, the British colony that is the scene of the Mau Mau uprisings, racial feelings are even stronger than they are in the American South. Yet an elementary school for white, Negro and Asian children has been in operation there since 1950.

The school was started in a one-room wooden building in Nairobi that formerly belonged to the Royal Air Force. The governor promised that if it succeeded a larger building on the grounds of Government House would be provided. That promise has been kept by his successor.

The school is a private one, and moderate tuition fees are charged. However, it does have a small government subsidy, from the appropriation for Asian education. A school official explained: "If it had come from the white education budget there would have been trouble."

So strong was white opposition that the minister of education had to give assurance that the government's policy of segregated education had not changed before the legislative council would approve the multi-racial school as an experiment.

The school opened with 15 pupils and one teacher. Now it has 38 pupils—10 Negroes, 20 Asians, and eight whites—and three teachers. Eventually there will be 50 pupils—15 whites, 15 Negroes, and 20 Asians.

The children range in age from 6 to 12. They are admitted on the basis of their home background and their ability to benefit from the environment and instruction, which is in English. Graduates of the school must go on to segregated secondary schools, which undoes some of the benefit of the experimental school. The board of governors is now trying to raise \$150,000 to establish a multi-racial secondary school. Meanwhile, the elementary school children are learning to live together, in and out of school. For instance, they visit one another's homes for birthday parties.

Opposition is still strong. But those who are responsible for the multi-

racial school are not dismayed. They feel deeply that they are right and that in time integration will be recognized as a practical means of achieving race harmony among Kenya's mixed population.

BOYS AND GIRLS in junior high school want, more than anything else, to grow up quickly, to do all the things older students and adults do. But there may be danger in growing up too fast.

"We believe we need to help boys and girls grow up and live well with others, but we need also to be very careful that experiences they get are on the level of adolescents," explains H. Ray Miller, junior high school principal at Fort Dodge, Iowa.

To help boys and girls get along well and feel at home with people at

all usually pretty much planned by the pupils, who act as hosts, with their parents as guests.

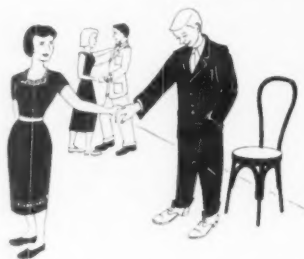
WHEN SUMMER COMES to Hamilton, Ont., some of the children go to the Royal Botanical Gardens for their lessons.

The lessons concern the growing of vegetables and flowers in their own 8 by 18 foot plots in one corner of the gardens. During the last 10 years about 500 children, ranging in age from 8 to 13, have taken part in the project, designed to interest youngsters in growing their own vegetables and flowers.

The children (48 in 1956) are selected each spring from a list of applicants received from all public schools in the city and district. Leslie Laking, director of the Royal Botanical Gardens, was one of the originators of the children's garden and still is its supervisor. Choosing the prospective gardeners has become an important phase of the project, he says. It is necessary to pick children who are enthusiastic about gardening and will stick with the project throughout the summer.

As soon as they are selected, the children start weekly meetings, each Saturday in the garden house, where they are given instructions about seedling and a basic knowledge of gardening. When summer comes, they plant their seeds under the direction of Mr. Laking and two volunteer assistants. The first year each gardener plants the same vegetables—lettuce, radishes, carrots, onions, beets, spinach and corn. Senior gardeners, those who return for two or three years, try more unusual plants—okra, cos lettuce, broccoli, dill, salsify, eggplant, peanuts and squash.

Every Thursday during the summer the children work in their gardens. They are pretty much on their own but may ask for advice when they need it. When harvest time comes, the youngsters proudly take home their produce. Sometimes they make a profit, selling the vegetables to their parents.



all types of activities, the Fort Dodge school plans such social events as these:

1. Homeroom parties, at noon or after school. It is understood that all homeroom parties end at 6 p.m.


2. Club activities, such as band, choir, audio-visual, student council and drama.

3. Grade parties—for all boys and girls in the 10 or 12 homerooms making up a given grade. Each grade may plan one party each six weeks. Parties are held in the evening, but they start early and end early. Parents are always welcome to attend. Roller skating parties are popular; if dancing is planned, there are always other activities and games; no one needs to stay away because he doesn't dance.

4. School teas, homeroom programs, displays of projects, round table discussions, open house, and Dad's Nite—



Never before such  
Golden Ease...such speed,  
such print-perfect  
results!

Now like  wearing "Magic Gloves" . . . . Golden Touch Typing

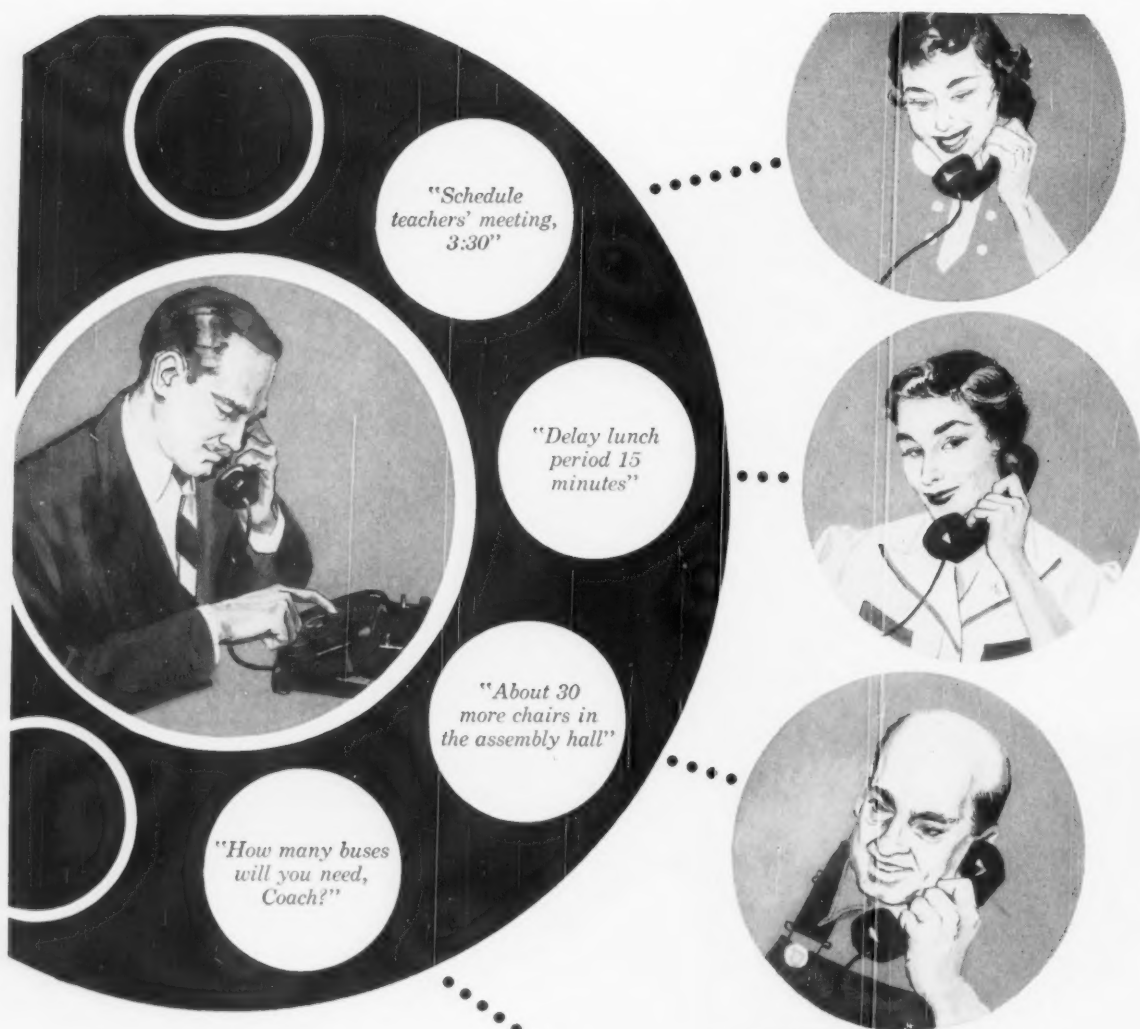
Now, The Golden Age of Golden Touch! Suddenly (as if you'd put on "magic" gloves), your hands have exciting new precision with glorious, new typing ease. The new Underwood Golden Touch Electric sharpens your skill; saves your strength and precious time as no other kind of typewriter can. And for "Him", . . . truly print-perfect letters, with carbon after carbon after carbon print-perfect, too.

P.S. Call your Underwood office today.  
See the Golden Touch Electrics in 5 smart new colors.  
Underwood Corporation • 1 Park Ave. • N. Y. 16, N. Y.

### new...underwood *Golden Touch*

Keyboard Margin-Setting . . . . .ends wasteful hand-travel!  
Multi-Carbon Dial . . . gets you set for up to 20 clear copies!  
Electric Ribbon Re-Wind . . . . .ends messy ribbon-change!  
Cushioned Power . . . . .for wonderful new, day-long quiet!  
Automatic Carriage-Return . . . ends tiresome carriage-fling!  
Half-Moon Keys . . . perfect protection against chipped nails!  
Personalized Type Styles . . . . .for distinguished letters!

**underwood** ...the only electric typewriter with *Golden Touch*



## ADMINISTER right from your desk!

To rate "A" in Administration, organize your work around a P-A-X Telephone System. A P-A-X "inside" telephone on your desk gives you *fingertip control* over all school activities. Just dial a number and—without moving from your chair—you can reach any member of your faculty, office, gym staff, maintenance department, to give orders or exchange confidential information.

Why not get all the facts on this privately-owned telephone system that assures *privacy* in communications? Write or call Automatic Electric Sales Corporation, (HAYmarket 1-4300) 1033 West Van Buren Street, Chicago 7, Illinois. In Canada: Automatic Electric Sales (Canada) Ltd., 185 Bartley Drive, Toronto. Offices in principal cities.

**AUTOMATIC ELECTRIC**

Originators of the dial telephone • Pioneers in automatic control



For the complete story on how P-A-X can be employed to co-ordinate school administration and solve communication problems, send for your free portfolio: "Stop Running Around in Circles."

# Logan

- 12" SWING
- 1" COLLET CAPACITY
- 1 1/4" SPINDLE BORE
- 23" and 35" CENTERS
- VARIABLE SPEED OR  
DOUBLE V-BELT DRIVE

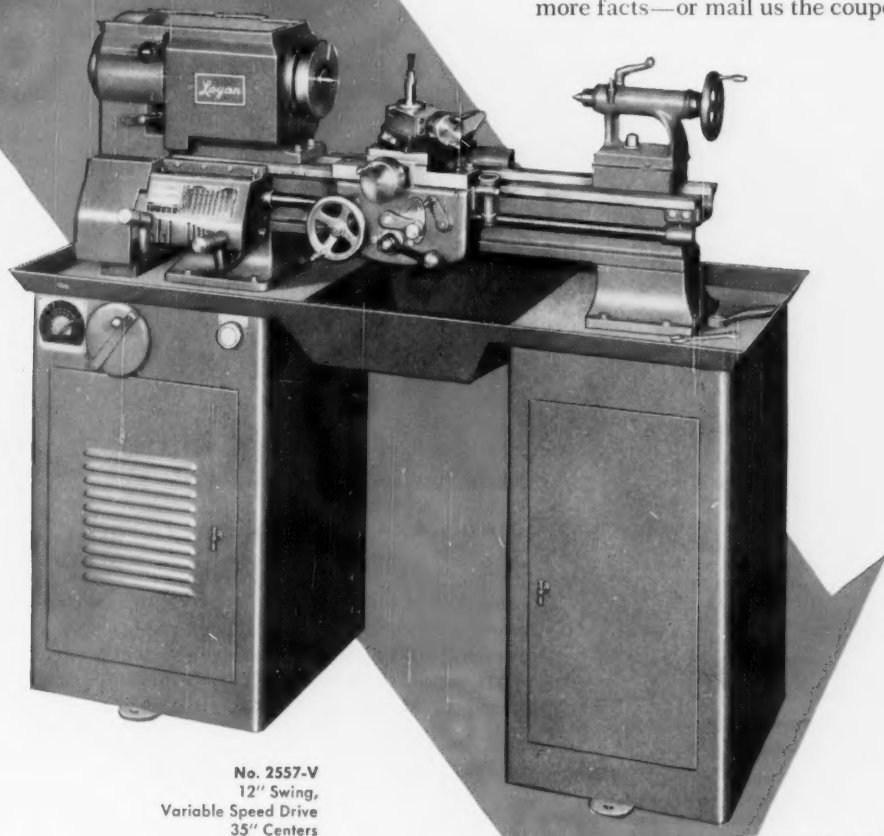
## GIVES SCHOOL SHOPS

### ACCURACY, CAPACITY AND POWER

This 12" swing lathe typifies Logan advanced design and rugged construction. Gears are extra wide and strong. Shafts are extra heavy. The lead screw has a full 7/8" diameter.

The precision carriage rides on a two-V-way, two-flat-way bed that is rugged, precision ground and warp-free. The heavy spindle turns on oversize ball bearings, no bearing adjustment needed for any speed between 38 and 1575 rpm.

This lathe, and every Logan Lathe from 14" swing down to 9" swing, is dynamically balanced before it is shipped. The result is *sustained accuracy* and smooth, quiet power on every lathe turning operation. See your Logan Lathe dealer for more facts—or mail us the coupon below.



No. 2557-V  
12" Swing,  
Variable Speed Drive  
35" Centers

**THIS COUPON**  
will bring you full details  
on Logan Lathe construction  
and specifications.

#### LOGAN ENGINEERING CO.

4901 West Lawrence Avenue, Chicago 30, Ill.

Send me full facts on the Logan line.

Name . . . . .

School . . . . .

Street . . . . .

City . . . . . Zone . . . State . . . . .

# EVEN A FIRST GRADER CAN EASILY OPERATE THE *Bell* RT-88 TAPE RECORDER



All control buttons are grouped for easy, one-hand operation.

#### Three Motors

The Bell RT-88 Tape Recorder also incorporates an exclusive 3-motor mechanism (the only 3-motor tape recorder in this price class) to reduce annoying "wow" and "flutter" to the point of negligibility.

#### Light Weight

It's easy to carry from room to room, since it is one of the lightest tape recorders on the market. However, it is ruggedly built for service-free portability and to endure the rough operation encountered in school use.



## "Piano Keys" control it . . .

### insure top quality recording

**Piano Key Controls** — All functions of the Bell RT-88 Tape Recorder (except tone and volume) respond to a gentle touch of its exclusive "Piano Keys" controls—conveniently grouped for easiest possible operation. The "Record" key has a fool-proof locking device to prevent accidental erasure.

You should investigate this fine educational tool. Write now for full color literature and your nearest dealer's name.



Export Office: 401 Broadway, N.Y.C. 13

In Canada:

Chas. W. Pointon, Ltd., 6 Alcina Ave., Toronto 10, Ont.



*Standard of all Comparison*

# HERRICK STAINLESS STEEL\* REFRIGERATORS

**Ruggedly Built to Stand Heavy Wear  
in Hot, Busy Kitchens**

HERRICK Refrigerators are engineered for exceptionally long life and trouble-free service. Their extra heavy-duty construction enables them to withstand hard usage. Year in and year out, HERRICK delivers more real value per dollar. For the finest, specify HERRICK Stainless Steel . . . the ultimate in lasting beauty. Write for the name of your nearest HERRICK supplier.

\*Also available with white enamel finish.



**HERRICK Model RSS66**  
6-Door Reach-In for Remote Installation

**HERRICK manufactures a complete line of  
Refrigerators, Freezers and Walk-In Coolers**



**Model TSS66**  
Top Mounted Reach-In

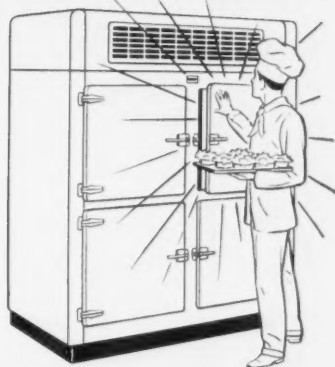


**Model SS40FP**  
Upright Freezer



**Stainless Steel**  
Walk-In Cooler

**HERRICK REFRIGERATOR COMPANY • Waterloo, Iowa**  
Dept. N., Commercial Refrigeration Division



**HERRICK Refrigerators are  
Made Better to Last Longer**

**Durable, Heavy-Duty Cabinets**

Strong, solid construction assures endless years of service. All corners are rounded.

**Husky, Oversize Cooling Coil**

Provides minimum temperature change from top to bottom. Aluminum housing.

**Extra Strong, Slam-Shut Latches**

Withstand day-after-day door slamming without breaking down. Convenient.

**18-8, 20-Gauge Stainless Steel**

Not a plated finish, but a solid metal. Won't crack, chip or peel. Acid-resistant.

**Lifetime Fiberglas Insulation**

Rot-proof . . . wear-proof. Will not settle. 3" thick in walls, 3 3/4" thick in doors.

**Highly-Skilled Craftsmanship**

Careful attention to every detail assures trouble-free performance at all times.

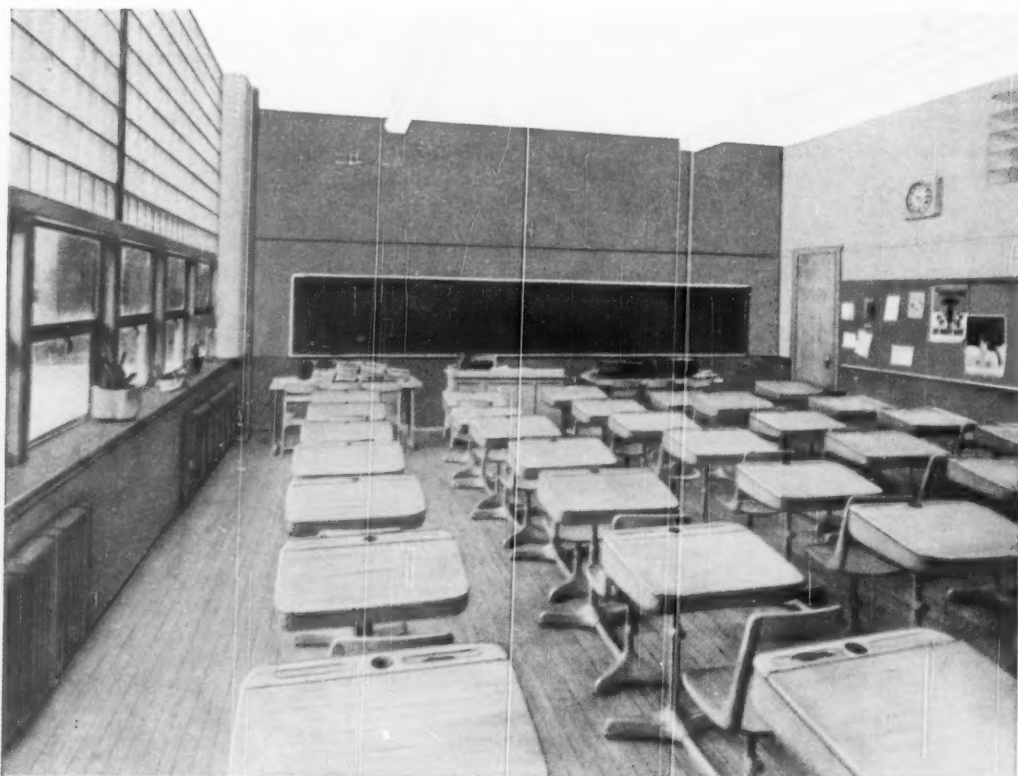
**Typical Installations**

**HERRICK Refrigerators are  
Performance-Proved at:**

- University of Pittsburgh  
Pittsburgh, Pennsylvania
- University of Missouri  
Columbia, Missouri
- Deland Senior High School  
Deland, Florida
- Imperial Ethiopian College  
Harar, Ethiopia
- Wisconsin State College  
Milwaukee, Wisconsin
- Aldine Senior High School  
Houston, Texas
- McKinley School  
Crookston, Minnesota

# PITTSBURGH COLOR

## Benefits Pupils of all Ages!



Reflected light is improved and at the same time an atmosphere of stimulating warmth and cheerfulness is provided by the use of more than one color in this classroom.

**"COLOR DYNAMICS" is best  
and most economical  
painting method!" says  
school superintendent.**

"The bright, pleasing colors have made a remarkable difference in the amount of light in our classrooms. This is quite important to the study and work habits of our pupils and teachers. Patrons and visitors frequently compliment us on the pleasant changes COLOR DYNAMICS has effected. We have found this color plan as well as Pittsburgh Paints to be not only the best but also the most economical. Our experience has been so satisfactory we plan to continue this program in our school system."

MILTON GARRISON, *Supt.*,  
Center Public Schools,  
Kansas City, Missouri.

**E**XPERIENCE of educators in hundreds of schools and colleges has demonstrated that Pittsburgh COLOR DYNAMICS improves the academic grades and behavior ratings of students of all ages.

**Most convincing evidence** that color environment affects work and study habits is the intensive two-year study of the record of more than 2,500 pupils in Baltimore schools. This test reveals that learning is accelerated and behavior is improved in schools painted ac-

cording to the modern principles of COLOR DYNAMICS.

**By painting school rooms** with COLOR DYNAMICS you give them color arrangements in keeping with their design and their lighting. You also take into consideration the ages of the pupils who use these rooms and the work they do. You paint sunny effects into gloomy rooms and corridors. You bring cool relief into rooms that face the bright afternoon sun. Cold, unfriendly rooms appear cheerful and



# PITTSBURGH

PAINTS • GLASS • CHEMICALS • BRUSHES

PITTSBURGH PLATE

IN CANADA: CANADIAN PITTSBURGH INDUSTRIES LIMITED

# DYNAMICS®

Experience in hundreds of schools and colleges is convincing proof that planned color environment improves work and study habits.



In this vocational classroom, an industrial area has been simulated. Machines, walls and ceilings have been painted with eye-rest colors that also provide bright and cheerful surroundings.

inviting. Small, stuffy rooms are made to seem spacious and airy.

By such purposeful use of color you can lessen eye strain and stimulate concentration. You can give your pupils more cheerful surroundings. The pride they'll take in their improved environment will often simplify housekeeping problems and discourage vandalism.

Why not try COLOR DYNAMICS next time you paint—and see the difference it makes in performance and behavior traits.

**PAINTS**  
PLASTICS • FIBER GLASS

GLASS COMPANY

## Only a few of the Many Schools Painted the COLOR DYNAMICS Way!

MacAlister College, St. Paul, Minn.  
Ball State Teachers' College, Muncie, Ind.  
Georgia Teachers' College, Savannah, Ga.  
Hendrix College, Little Rock, Ark.  
Monessen High School, Monessen, Pa.  
Monte Vista High School, Monte Vista, Colo.  
Midway High School, Washington, Pa.  
Snyder High School, Snyder, Tex.  
Durand, School, Pt. Pleasant, N.Y.  
St. Johnsville Central School, Utica, N.Y.  
Anthony Elementary School, Anthony, N.M.  
Kent Elementary School, Kent, Ohio

## Let us make a FREE Engineered Color Study of Your School

We'll be glad to send you our profusely illustrated book containing scores of suggestions how to use COLOR DYNAMICS in school painting. Or we'll be glad to make an engineered color study of your school, or any part of it, without cost or obligation. Call your nearest Pittsburgh Plate Glass Company branch and arrange to have one of our representatives see you at your convenience. Or mail this coupon.



**Pittsburgh Plate Glass Co.,  
Paint Div. Dept. NS-106,  
Pittsburgh 22, Pa.**

☐ Please send me a FREE copy of your booklet "Color Dynamics for Grade Schools, High Schools and Colleges."  
☐ Please have representative call for Color Dynamics Survey without obligation on our part.

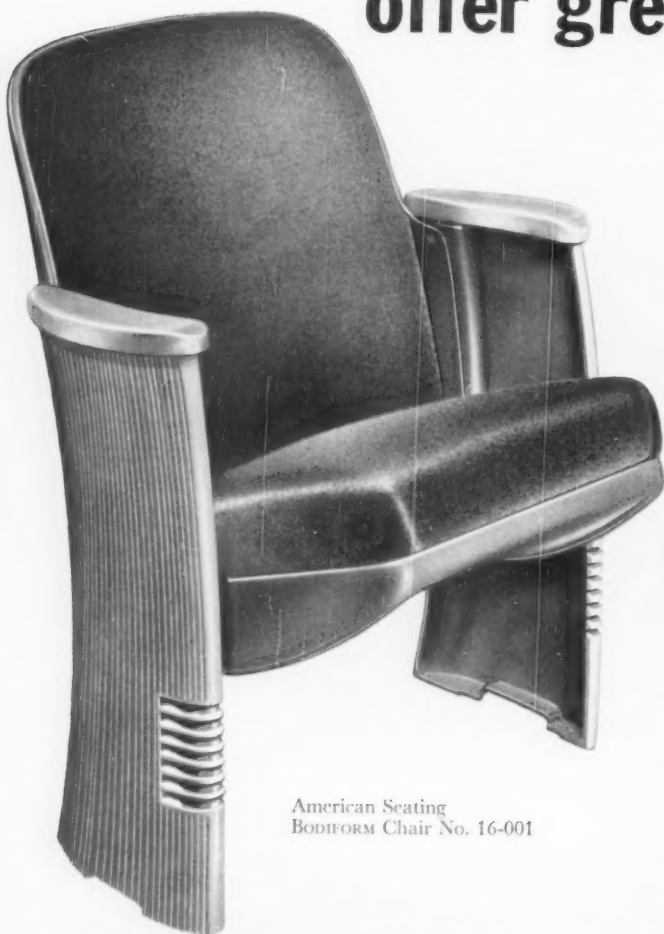
Name \_\_\_\_\_

Street \_\_\_\_\_

City \_\_\_\_\_

County \_\_\_\_\_ State \_\_\_\_\_

# American Seating Bodiform® Chairs offer greater use-value!



American Seating  
BODIFORM Chair No. 16-001



Gray-iron standards won't break, bend or dent; sturdy and quiet. Middles have turned-in feet, eliminating stumbling hazard.

In the first place, spring-arch seat construction, backs with body-fitting contours, assure matchless comfort through years of hard use. These restful, attractive chairs are available in a wide range of styles and colors. Because they are upholstered, BODIFORMS are treated with greater care by students—insuring longer life, less maintenance.

## More passing room

Then, too, American Seating BODIFORM full-upholstered auditorium chairs feature silent, uniform,  $\frac{3}{4}$ -safetyfold seat action that causes the seat to fold automatically when occupant rises. This allows more room for passing, easier housekeeping.

## Improve acoustics

And upholstered seats and backs improve acoustics. For example, in a half-filled auditorium, the upholstery compensates for any empty seats, thus aiding sound reception.

## Most complete line

American Seating offers the most complete line of school furniture and auditorium chairs on the market, with the greatest use-values in every price class. More schools buy American Seating products than any other make—consequently, more students go to school to the comfort and good posture of American Seating equipment than to any other type or make. Write for our newest literature.



No. 16-001 TA

**All models** available with tablet-arms, variety of aisle standards. Rigid in use, tablet-arms fold automatically when occupant rises.

**AMERICAN  
SEATING**



**WORLD'S LEADER IN PUBLIC SEATING  
GRAND RAPIDS 2, MICHIGAN**

Branch Offices and Distributors in Principal Cities,  
Manufacturers of School, Auditorium, Theatre, Church,  
Stadium, Transportation Seating, and Folding Chairs.



# Ceiling of SUNLIGHT

**School Skylights  
of COOLITE  
Wire Glass  
Keep Interiors  
Bright and  
Cheerful**



**NORMANDY PARK ELEMENTARY SCHOOL,  
Seattle, Washington**

Architect: Waldron & Dietz

Photographer: Dearborn-Massar

Because of its very pleasant flood of light, Coolite Wire Glass, skylighting the Normandy Park Elementary School corridor in Seattle, Washington, has excited more comment than any other space in the school, relate Waldron and Dietz, Architects. This cheery glow of softened, diffused daylight is borrowed by adjoining rooms providing extremely high levels of glare-free, natural illumination. The glass creates an open, airy atmosphere and appears as clear, blue sky even on overcast days. The same Coolite Wire Glass is used in the multipurpose room. Mr. Waldron reports that "it has proven entirely satisfactory for elementary school use... direct light of this variety is desirable because it is pleasant and cheerful."

Coolite removes the harmful qualities of "raw" sunlight, helps students see better, work better, feel better. Coolite permits use of large areas of glass without undue heat and discomfort, makes rooms appear larger, friendlier.



Write today for free copy, "Better Daylighting For Schools". Address Dept. 15.

Translucent, light diffusing glass by Mississippi for better daylighting is available in a wide variety of patterns and surface finishes to fit any need within any school budget. Take advantage of Mississippi's wide experience. The company conducts a continuing study of school illumination in an experimental school building constructed on factory grounds. Its technicians are ready to help you with your daylighting problems.



**MISSISSIPPI Glass COMPANY**

88 ANGELICA ST.  
NEW YORK • CHICAGO



SAINT LOUIS 7, MO.  
FULLERTON, CALIFORNIA

WORLD'S LARGEST MANUFACTURER OF ROLLED, FIGURED AND WIRED GLASS





### A PLUS IN DESIGN

Years ahead... that's the designing secret of American Desk classroom furniture. For quality... durability... functionality... it's often imitated, but *never* duplicated. Take American Desk's Airplane Table and No. 44 Cluster Chair for example. Handsome and neat in appearance, this versatile unit is excellent for grouping elementary students in privacy without confusion or waste of space. Comes with either die-formed or tubular steel legs, steel frame and panels; tops are highly finished maple, birch or Fibre-plastic. Top sizes are 21" x 42"; 21" x 48"; 24" x 48".



*american desk*

MANUFACTURING CO.  
TEMPLE, TEXAS

For Competent Assistance, Complete Details, Ask Your State AD Representative



erase  
this shadow  
from his future

## with **GUTH LIGHTING**

What gift could be of greater value to students than  
*lighting that protects their normal vision?*

Their ability to see...to learn quickly and prepare for the  
future...their posture, health and happiness all depend greatly  
on proper classroom lighting.

Act now! Keep their future bright with sight-saving  
GUTH LIGHTING...developed especially for classrooms through  
more than a half-century of lighting experience.

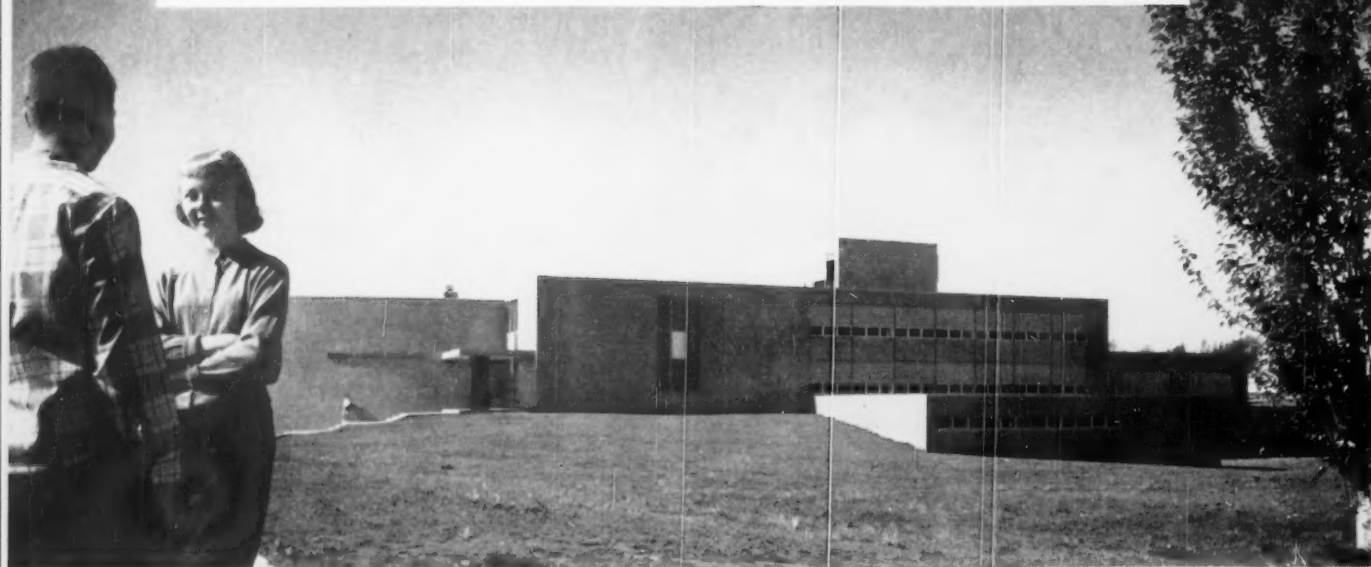
Write for detailed information on Guth School Lighting today.



THE EDWIN F. GUTH CO. ST. LOUIS 3, MO.

*Leaders in Lighting Since 1907*

# The Modern Approach to School Planning . . . GET MORE COMFORT PER DOLLAR, SPEND LESS FOR HEATING



Increasingly high comfort standards, on the one hand, and pressure to reduce operating expenses, on the other, have centered interest on the importance of automatic temperature control. For both *comfort* and the *cost of comfort* in today's schools are determined largely by the efficiency of the control system.

In the impressive new Edison Junior High School\* progressive school planners have demonstrated how it is easily possible to stress economy while making exceptionally complete provisions for student and teacher comfort. Some of the highlights of this up-to-the-minute comfort control system are shown by the accompanying photographs.

Those who subscribe to the modern idea of getting more comfort per dollar know that Johnson offers the most practical means of achieving it. The Johnson organization has over 70 years' experience in solving the temperature regulation problems of schools—*more specialized experience than anyone else!*

Johnson engineers apply this experience specifically to your individual problems—each Johnson System is designed and installed to meet the exact needs of the

individual building, its occupants and its particular heating and ventilating equipment. This combination of unmatched experience and expert application results in control systems that

are unsurpassed for comfort as well as economy.

Any building, small or large, can enjoy the comfort and money-saving advantages of a Johnson-engineered Control System. Why not discuss your temperature control problems with a Johnson engineer soon? His recommendations are yours without obligation. Johnson Service Company, Milwaukee 1, Wisconsin. Direct Branch Offices in Principal Cities.

\*Edison Junior High School, Sioux Falls, South Dakota. Harold Spitznagel & Associates, architects, Sioux Falls; Homer Bird, mechanical engineer, Minneapolis; Carlson & Glasgow, mechanical contractors, Sioux Falls.

## JOHNSON CONTROL

SINCE 1885

PLANNING • MANUFACTURING • INSTALLING



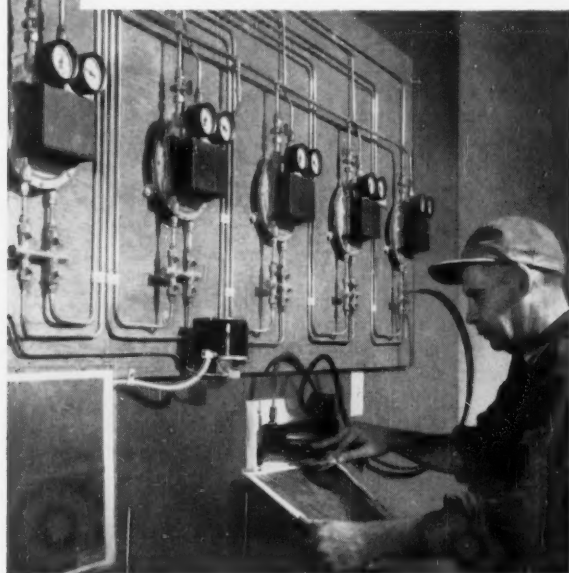
**ON THE WALL** of each classroom, sensitive Johnson Thermostats provide precision, waste-free regulation of both heat and ventilation. Use of *individual room control* makes certain that occupants of each room enjoy ideal temperatures, even though heat and ventilation requirements often vary widely from one classroom to another due to differences in exposure, occupancy levels, activities and other factors.



**HEATING AND VENTILATING** of this modern building are accomplished by a combination of central fan heating and ventilating units and convector radiation. The entire system is automatically coordinated at all times to insure the greatest possible operating efficiency. Corridors, the gymnasium, auditorium, cafeteria and other large spaces are as closely controlled as classrooms.



**UNIFORM AIR DISTRIBUTION** is essential to consistent comfort. Opening and closing of dampers as air is discharged at various points throughout the building could result in too little ventilation in some rooms, too much in others. Here, behind the scenes, Johnson Static Pressure Regulators keep the entire ventilation system in perfect balance and insure even air distribution at all points.

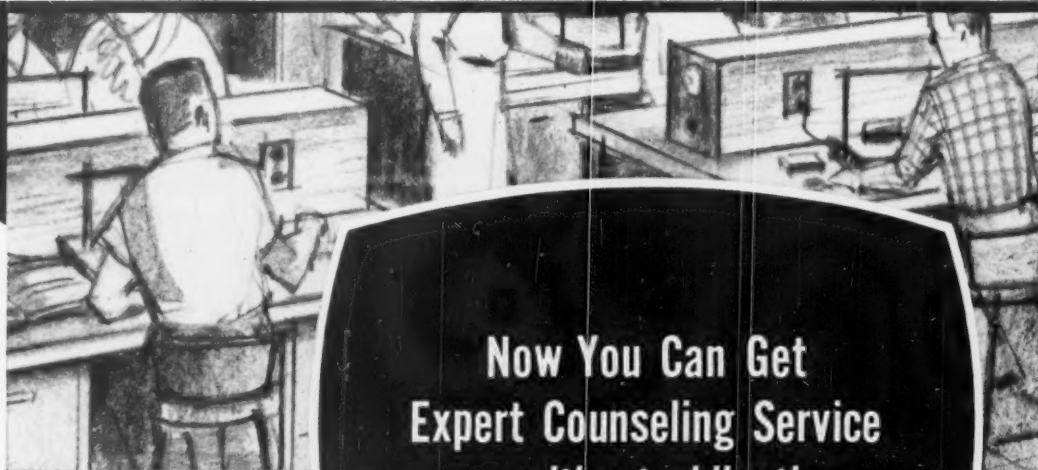


**OUTDOOR AIR FOR VENTILATION** is admitted through the action of Johnson Dampers and Damper Operators. Air is heated only enough to offset the effects of outdoor temperatures. The temperature of the water supplied to the convector radiation is also controlled according to outdoor conditions. This weather-compensated primary control adds greatly to comfort while minimizing fuel consumption.





Planning a new electrical shop? Remodeling or expanding your present shop?



Now You Can Get  
Expert Counseling Service  
... without obligation

● Designing and equipping an electrical or electronics shop can be a costly, complicated business, full of pitfalls for the unwary. It calls for expert guidance, something that has been nonexistent where such shops are concerned.

Now steps have been taken to remedy this situation. Crow Electri-Craft has established a new **SCHOOL COUNSELING SERVICE**—the only one of its kind anywhere—to help you outfit your shop with the equipment that best meets your needs . . . and to insure that you get maximum value for every dollar spent.

#### Why Crow Is Able to Offer This Unique Service

For more than two decades, Crow Electri-Craft has worked to bring more and better electrical and electronic instruction to secondary schools. Crow's famous "learn by doing" Electri-Kits have played an important part in this crusade. The wealth of practical experience gained over this long period gives Crow an intimate acquaintance with the problems of setting up an electrical shop. Now . . . without cost or obligation . . . your school can take full advantage of this experience.

#### You Furnish the Walls . . . We'll Do the Rest

If yours is a new school plant, or if you are adding an electrical shop to your present facilities, Crow

will supply detailed recommendations for the *complete* shop—including wiring, conduits, power supplies, workbenches, meters, instruction equipment, manuals and course outlines. Equipment will be recommended scientifically on the basis of present enrollment, anticipated growth, student age and proficiency level, scope of curriculum, and physical size of shop.

If your present appropriation does not permit a complete shop installation, Crow will plan a *basic* shop that will best fulfill your current requirements and allow for future expansion as additional funds become available.

You can also take advantage of Crow Counseling Service when *remodeling* or *expanding* your present shop facilities.

In any case, Crow consultants will work with you or your architect to provide your school with a *practical, highly integrated* shop that will prove its soundness of design for years to come.

**TO AVAIL YOURSELF OF THIS SERVICE—**write Dept. 336P for School Counseling Service questionnaire.

**CROW ELECTRI-CRAFT CORP.**

Division of Universal Electronics Co., Inc.

1102 Shelby Street  
Vincennes, Indiana

# SHOWER-UP







a safe shower



Injury may occur when student jumps from shower because of sudden temperature change.



Hydrguard lets each bather select the temperature he likes best.



If cold water supply fails, Hydrguard shuts off the hot water instantly, automatically.

**P O W**  
**H Y D R O**



# or possible injury?

## Powers HYDROGUARD® Thermostatic Control protects against sudden temperature variation

When shower temperatures fluctuate, as they often do for a number of reasons, students in the shower scramble to avoid the sudden spray of hot or cold water — they may slip, fall or be scalded. This danger can be avoided with Hydroguard®, the *thermostatic* shower valve that provides positive safety plus individual temperature control.

With the turn of *one* dial, each student can have the temperature he enjoys most — warm, cool or anywhere in between. Once set, Hydroguard maintains that temperature regardless of changes in supply pressure or supply temperature. As an added precaution, Hydroguard® has a built in safety limit so that it cannot deliver water hot enough to scald... even if the dial is turned all the way to "Hot." It

shuts off the hot water instantly, automatically, if the cold water supply fails.

*Only a thermostatic control offers you this complete protection.*

Hydroguard® conserves hot water formerly wasted while adjusting and balancing the hot and cold water valves to the desired temperatures; it simplifies piping and tile work and improves appearance.

Specify Hydroguard® *thermostatic* valves for your new school shower room, dormitory, gymnasium, or swimming pool — then you'll *know* that safety and comfort have been provided.

### THE POWERS REGULATOR COMPANY

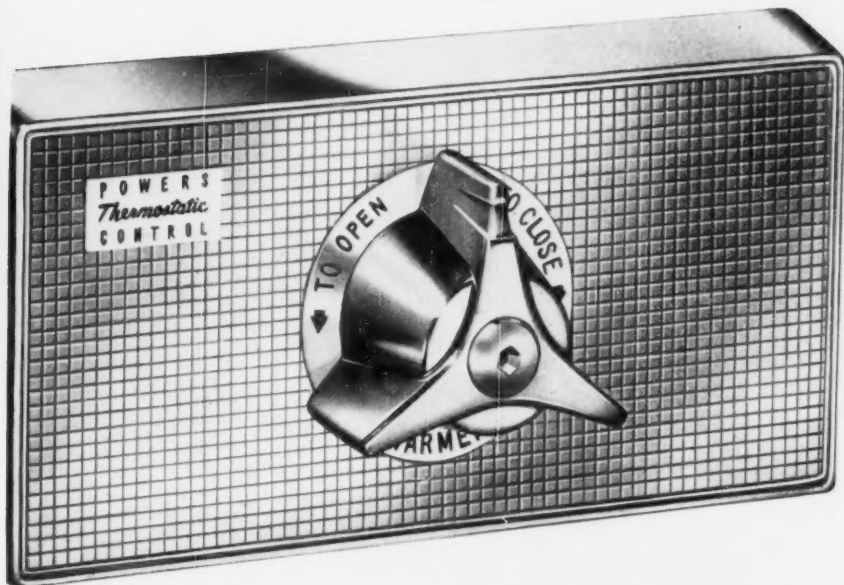
Skokie 5, Illinois

Specialists in thermostatic control since 1891



Charles W. Nichol & Associates, Chicago — Architect  
John K. Fairbairn, Chicago — Mechanical Engineer

Palatine (Ill.), Township High School has Hydroguards® in more than 60 showers.



Additional information is available in our new booklet, "Safer Showers." Write for your copy today.

# POWERS

# GUARD®



## An Ideal

*One example of the need for individual classroom ventilation control is the use of audio visual instruction. Honeywell's Schoolmaster wall thermostat in each room prevents stuffiness that makes students sleepy when blinds are drawn. This results in increased alertness and receptiveness.*

*New thermostat, The Honeywell Round. One in each classroom makes it possible to adjust temperature to meet varied activities of children.*



# Climate for learning

Amount of "take home learning" increases  
with thermostat in every room

**E**FFECTIVE teaching calls for proper temperature and ventilation. In a stuffy classroom students grow sleepy when, for example, blinds are drawn for audio-visual education. How can you control such factors?

The best way is with mechanical ventilation and a thermostat on the wall of each room. Such "climate conditioning" is the idea behind the Honeywell Schoolmaster Temperature Control System. Individual room thermostats allow the teacher to maintain the right conditions for classroom alertness—at all times of the day regardless of instruction methods.

In addition, the Schoolmaster System includes an indicator panel for the principal's office which gives a fingertip report on all room temperatures.

The Schoolmaster is an exclusive Honeywell development, designed for any school—new or old. No

major building alterations are necessary, as the wiring is simple.

For complete information, call your local Honeywell office, or write to Honeywell, Dept. NS-10-07 Minneapolis 8, Minnesota.

**The Schoolmaster System: A special wall thermostat for each room and Principal's Monitor Panel**

*Indicator panel* gives the principal a fingertip report. It is wired to a special sensing element in each room thermostat to provide the principal with a push-button temperature reading for any room in the school. It functions also as an auxiliary fire detection system.



MINNEAPOLIS  
**Honeywell**

School Temperature Controls



112 OFFICES ACROSS THE NATION



Nesbitt "package" consists of unit ventilator (center), with finned-tube radiation housed in grilled casings extending to each side.

## Nesbitt Syncretizer with Wind•O•Line Radiation eliminates "wall of ice" along window surfaces

Low outside temperatures create "walls of ice" along schoolroom window areas. Nesbitt Syncretizers with Wind•O•Line Radiation substitute a blanket of warmth for the "wall of ice," and thus eliminate cold downdrafts from the windows.

The Syncretizer, attractive heating-ventilating unit, draws in room air, blending the proper amount of fresh outside air to ventilate classrooms efficiently, ending energy-sapping stuffiness.

Extending from both sides of the Syncretizer,

Wind•O•Line's finned tubes radiate heated air the entire length of the window sills. Together, as heating and ventilating units, Nesbitt Syncretizers with Wind•O•Line Radiation keep classrooms fresh and comfortable.

For full data and prices on these and other products for schools offered by American Blower — Ventilating Fans, Unit Heaters and Power Roof Ventilators — contact our nearest branch office, or write direct.

AMERICAN BLOWER CORPORATION, DETROIT 32, MICHIGAN  
CANADIAN SIROCCO COMPANY, LTD., WINDSOR, ONTARIO

Division of AMERICAN-Standard

**AMERICAN**



**BLOWER**





Mr. Ralph L. Martin,  
Assistant to the Superintendent,  
Consolidated School District #2,  
Raytown, Missouri.

**"We've been using**

**Fords in our fleet for 10 years.**

**And now we're buying six more"**

Dependable B-700. Carries 66 passengers.  
Wheelbase 245 in. Max. GVW: 21,000 lbs.

says Mr. Ralph L. Martin

#### **Ford meets these N.E.A. Safety Standards**

**Power-type brakes** shall be part of equipment for chassis designed for 48 passengers or more.

**Brake vacuum reservoir** shall be at least 1000-cu. in. capacity for vacuum-actuated systems.

**Front bumper** must be of sufficient strength to permit pushing vehicle of equal gross weight without permanent distortion.

**Drive shaft** shall be protected by metal guard to prevent it from whipping through floor or dropping to ground if broken.

**Fuel tank** shall have minimum capacity of 30 gallons and be made of 16-gauge terneplate or equivalent.

**Flexible gasoline-** and oil-proof connections shall be provided at engine end of fuel line.

**Rear springs** shall be of the progressive type.

**Stationary eyes** of front springs shall be protected by wrapper leaf in addition to main leaf.

**All tires** shall be of same size and ply rating.

#### **Ford surpasses these N.E.A. Safety Standards**

**Front axle** shall have gross weight rating equal to or exceeding load supported by front axle.

**Rear axle** shall be full-floating type and have a gross weight rating equal to or exceeding load supported by rear axle.

**4-wheel brakes** adequate to control fully loaded bus shall be provided.

**Brakes** shall be able to stop vehicle within 22 feet when driven at 20 m.p.h. over dry level road.

**Grade ability** must be such that bus can climb 3% grade at least 20 m.p.h. (fully loaded).

**Double-action** shock absorbers of adequate size shall be provided at front.

**Springs** must have ample resiliency to sustain fully loaded bus without evidence of overload.

**Steering gear** shall be designed to provide safe and accurate performance when vehicle is operated with maximum load and at maximum speed.

**"We carry over 5,000 children and cover 230 miles a day. Yet gas and oil costs average only 3.5 cents a mile."**

"We chose Ford because their standards in safety, reliability, and comfort meet or exceed N.E.A. Safety Standards," says Mr. Martin. "And for our specifications Ford's prices were lower than other makes."

For your operation you need the best. Ford pays off—costs less to buy, less to run. And Fords last longer (certified by independent insurance actuaries).

For '56, Ford offers you 5 new superior Short Stroke engines—from a 133-h.p. Six to the powerful 185-h.p. V-8.

Ford chassis are built to accommodate a complete range of bus body sizes—from 36-passenger or less, all the way up to high-capacity 66-passenger bodies.

See your Ford Dealer today, or write for details to: Ford Division of Ford Motor Company, P. O. Box B-2, Dearborn, Mich.

**BIG FLEET OWNERS BUY MORE FORD  
TRUCKS THAN ANY OTHER MAKE**



## WHICH CLASSROOM IS YOURS... 5 YEARS FROM NOW?

The Peabody 660 can whip any kid in the class. Built for today—will outlast your tomorrows. "Kid-tested" for years and still the winner. Extra Credits—Distinctive smooth lines; All parts in correct proportion—symmetrical; Suntan color blends with any room color scheme—proper light reflection; Solid northern hard maple wood parts; Large spacious formed steel bookbox; Flat bottom box for orderly desk-keeping; Sturdy reinforced steel box support; Rounded edges on saddle seat eliminates "under-knee" pressure; Ribbed front legs—strong and sanitary; Large hardened steel glides—kind to floors; Can be equipped with rubber shoes; Ample floor clearance to avoid crushing of dropped chalk or pencils; No exposed welds; Tamper proof adjustment; Posture correcting movable back; Adjust to student the only set up necessary; Wood parts—Suntan finish scratch resistant "Celsyn." Metal parts—Suntan ovenbaked enamel; Available with Fibersin plastic top.



*No one ever regretted  
buying quality.*



# PEABODY

NORTH MANCHESTER  
INDIANA

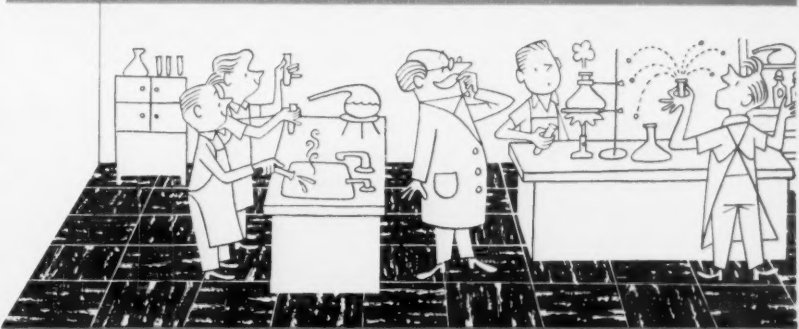
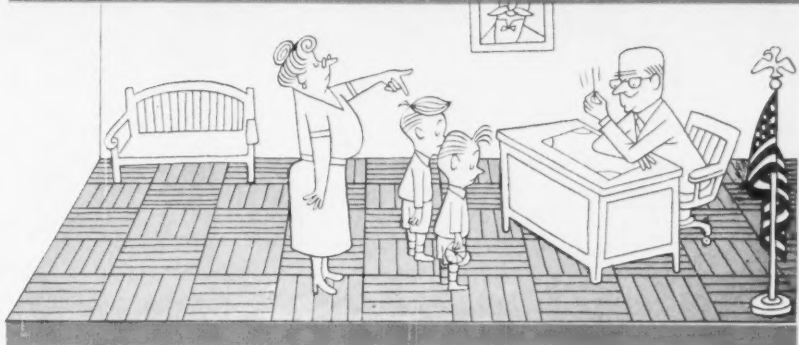
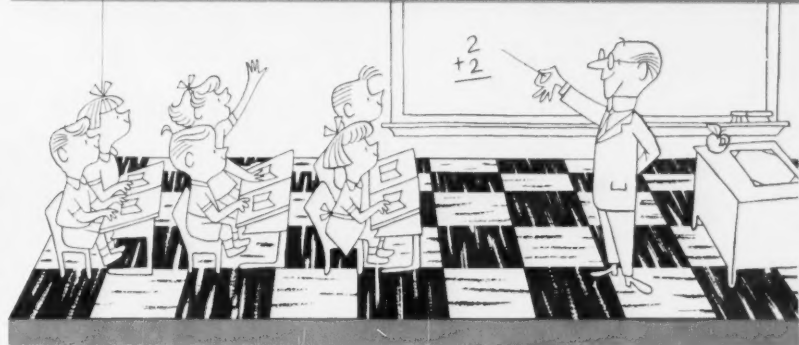
more  
and more  
schools  
are using

# MATICO

## TILE FLOORING

*because MATICO is  
in a class by itself!*

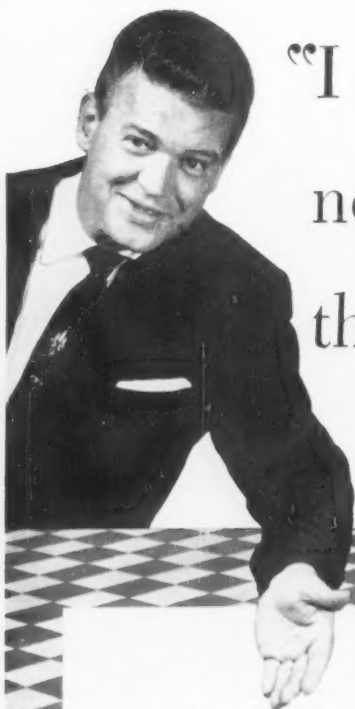
According to a recent survey, more school architects specify MATICO asphalt tile flooring than any other brand. The reasons are simple! Colorful! MATICO is low in cost . . . economical to maintain . . . presents no installation problem . . . and is fortified with plastic to stand up under roughest wear—day after day. In addition, MATICO Asphalt Tile is available in 29 colorful marbleized patterns and 10 smartly-styled Confetti patterns to offer unlimited design possibilities. If you're considering new flooring for your school, it will pay you to get all the facts on MATICO asphalt tile flooring. Write Dept. 24-10, Newburgh, N. Y.



### MASTIC TILE CORPORATION OF AMERICA

Houston, Tex. • Joliet, Ill. • Long Beach, Calif. • Newburgh, N. Y.

Confetti • Parquetry • Aristoflex • Maticork • Asphalt Tile  
Rubber Tile • Vinyl Tile • Cork Tile • Plastic Wall Tile



"I asked Vestal to prove their  
new *Style* out-performs  
the floor wax we use now!  
....and they did!"

with a demonstration that  
proved *STYLE IS* new...  
and *different* from any  
other floor finish.

The important difference is that  
*STYLE* keeps its original, "newly-  
waxed look" much longer — *why?*

- *STYLE* doesn't wax-scuff —  
because *STYLE* isn't a wax . . .
- *STYLE* doesn't "hold" dust and  
dirt because it doesn't contain  
sticky resins or soft waxes . . .

and *this important difference*:  
although wax-free, *STYLE* can be  
*buffed* like a wax—can be maintained  
either with or without buffing, as  
desired.

And *STYLE* can be easily removed  
and renewed—contains no spirituous  
solvents; won't harm any floor.



**You'll be helping yourself,  
and your maintenance personnel  
by tearing out and mailing this  
coupon before turning this page.**

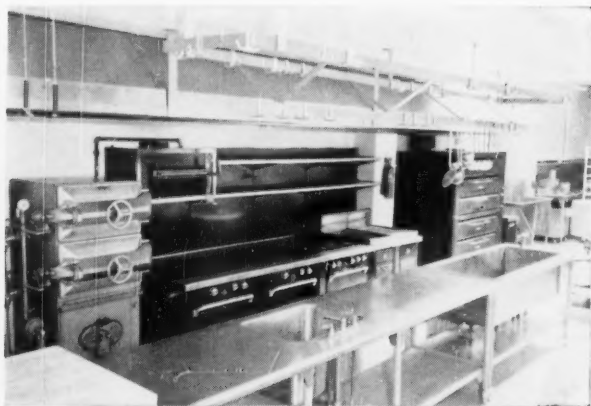
• VESTAL, Incorporated  
4963 MANCHESTER AVE., ST. LOUIS 10, MO.  
• Gentlemen: I'd like a free demonstration of your new  
• *STYLE* floor finish.  
• Name \_\_\_\_\_ Title \_\_\_\_\_  
• Company \_\_\_\_\_  
• Address \_\_\_\_\_  
• City \_\_\_\_\_ State \_\_\_\_\_







**2,000 hot, nutritious meals each school day**  
**... thanks to *GAS***

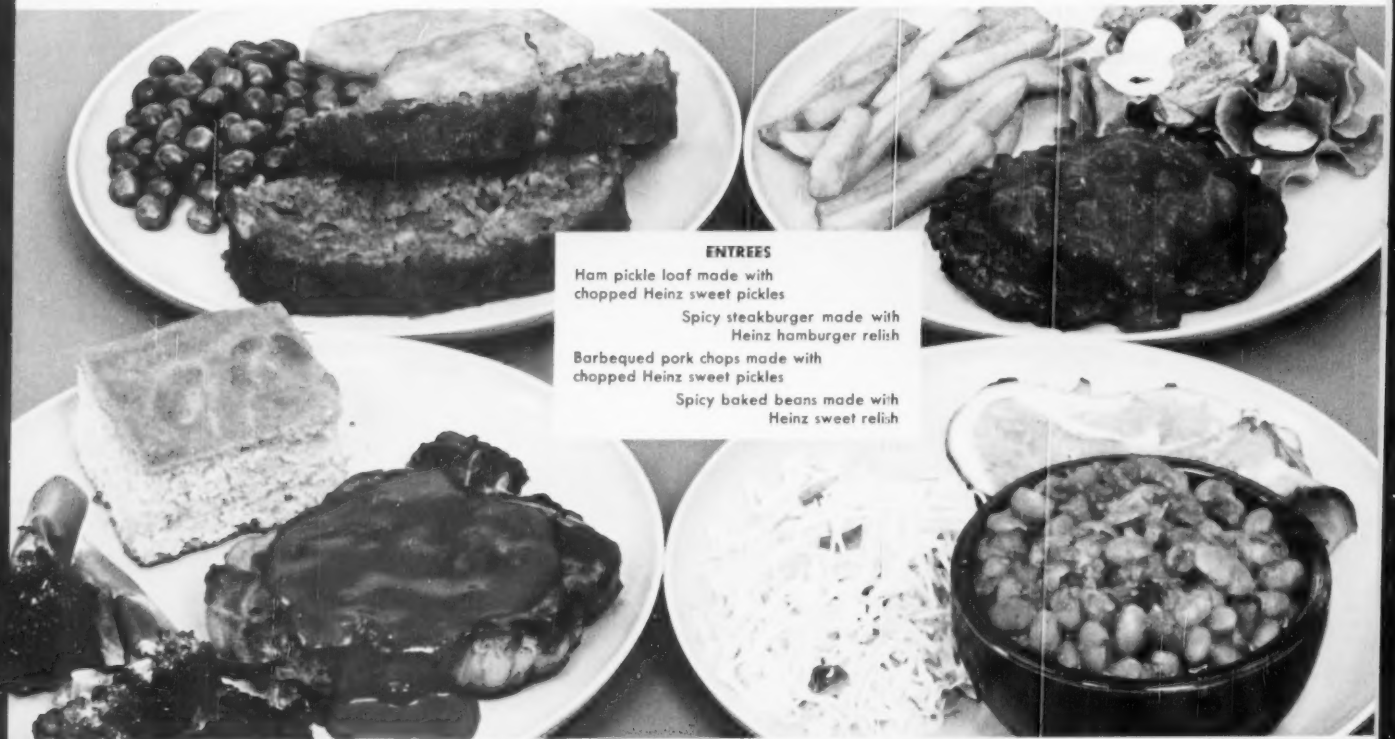


Kitchen of Morrell High School showing modern Gas-fired equipment.

Just one look at the efficient cafeteria operation of Morrell High School, Irvington, New Jersey proves Gas is best for performance, cleanliness, speed and economy. More than 2,000 hot, tasty meals are turned out every day in a streamlined operation using Gas-fired cooking equipment. Gas is preferred and used in all food service operations, from deep frying to baking and cooking. The modern Gas equipment includes 3 ranges, 2 fryers, a broiler and an Add-A-Unit, all by Magic Chef, as well as a Blodgett oven, a Groen stock pot, and a Cleveland Steam Chef vegetable cooker. A Blakeslee dishwashing machine and Plibrico incinerator complete Morrell's list of Gas-fired equipment.

For information on how you can benefit by using Gas and installing modern Gas equipment, call your Gas Company's commercial specialist. He'll be glad to discuss with you the economies and outstanding results you get with Gas and modern Gas equipment. *American Gas Association, 420 Lexington Avenue, New York 17, New York.*

# TWELVE LOW COST APPETITE APPEAL



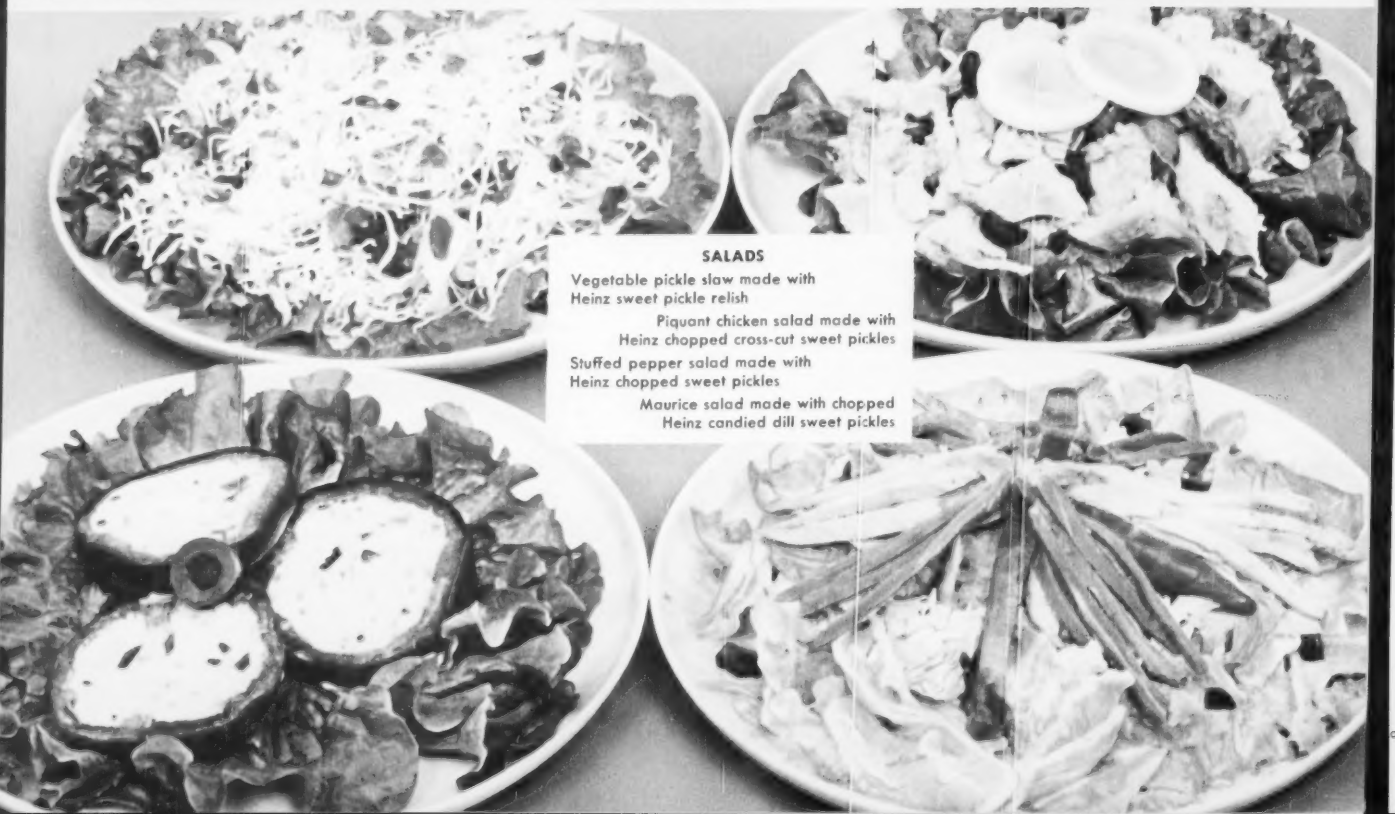
## ENTREES

Ham pickle loaf made with  
chopped Heinz sweet pickles

Spicy steakburger made with  
Heinz hamburger relish

Barbequed pork chops made with  
chopped Heinz sweet pickles

Spicy baked beans made with  
Heinz sweet relish



## SALADS

Vegetable pickle slaw made with  
Heinz sweet pickle relish

Piquant chicken salad made with  
Heinz chopped cross-cut sweet pickles

Stuffed pepper salad made with  
Heinz chopped sweet pickles

Maurice salad made with chopped  
Heinz candied dill sweet pickles

He  
me  
ad  
as  
oth  
an  
eas  
no  
pic  
for  
del  
app  
cou

H

NO

# IDEAS TO INCREASE WITH HEINZ PICKLES



## SANDWICHES

Ham salad sandwich made with  
Heinz chopped dill pickles

Pickle and cheese spread sandwich  
made with Heinz dill relish

Tuna and pickle sandwich made with  
chopped Heinz cross-cut sweet pickles

Salmon and cottage cheese sandwich made  
with Heinz candied dill sweet pickles

Here are 12 delicious, low cost new ideas for menu variety and appetite appeal. Nothing adds so much flavor to a dish, for so little cost, as Heinz Pickles. They blend beautifully with other foods. They add a spicy savor unlike anything else. Your customers will like these easy-to-prepare dishes. Try them soon. But note: These dishes were planned for *Heinz* pickles. For best results use only Heinz. Send for Heinz new booklet containing many more delicious, low cost ideas for boosting appetite appeal with Heinz pickles. Just mail in the coupon. Do it now!

## FREE: "PICKLES PICK UP PROFITS"

*Twelve pages of delicious pickle ideas*

H. J. Heinz Co., Hotel & Restaurant Division  
P. O. Box 28, D-8, Pittsburgh 30, Pa.

Let me see those pickle ideas. Send my free copy of your new booklet, *Pickles Pick Up Profits*.

Name \_\_\_\_\_ Position \_\_\_\_\_

Organization \_\_\_\_\_

Street \_\_\_\_\_

City \_\_\_\_\_ Zone \_\_\_\_\_ State \_\_\_\_\_

# HEINZ PICKLES

NOBODY MAKES PICKLES LIKE HEINZ

ONLY BEAUTIFUL BOONTONWARE BRINGS YOU

## Every Institutional Advantage with no Institutional Look



The outstanding virtues that put Boontonware into millions of homes have made it ideal for serving large groups.

- Boontonware's smart styling and color makes food look appetizing—*no heavy, ugly "institutional" pieces, no dull, crazed surfaces.*
- Boontonware is practically indestructible—*no broken or chipped dinnerware on your shelves.*
- Boontonware stacks evenly, handles easily and quietly—*no deafening handling clatter, untidy shelves.*
- To Sum It Up: Boontonware does all the things good dinnerware should do and *in addition . . . it practically pays for itself.*

There is a complete line waiting for you—plates, bowls, cups and service dishes. See your regular supply house or write us for the name of your nearest dealer.

Nine colors to  
mix or match

Gray  
Pink  
Rose  
Yellow  
Charcoal  
Turquoise  
Honeydew  
Buff  
Blue

# Boontonware®

MELMAC DINNERWARE AT ITS FINEST—

MANUFACTURED BY BOONTON MOLDING CO., BOONTON, NEW JERSEY



Boontonware complies with CS 173-50, the heavy-duty melamine dinnerware specification as developed by the trade and issued by U. S. Department of Commerce, and conforms with the simplified practice recommendations of the American Hospital Association.



# NISSEN TRAMPOLINES\*...Choice of over 5000 Schools Throughout the World



## A Salute to NEW TRIER HIGH SCHOOL, Winnetka, Illinois

The above drawing was made from an architect's rendering of New Trier High after the current six million dollar remodeling program is completed. Practically every phase of the school will benefit from this expansion program, which will provide the 3,000 students with the finest in high school educational facilities.



**JOE GIALLOMBARDO**, Instructor in Physical Education and Gymnastics Coach, joined New Trier High from the University of Illinois. He served three years in the U.S. Navy as instructor of Gymnastics and Physical Education, and is one of the authors of the text, "Gymnastics and Tumbling."

## "Our Gymnastics and Tumbling Program Has Greatly Improved with NISSEN TRAMPOLINES" — Joe Giallombardo

"The boys at New Trier are really enthusiastic about Trampolining," says Joe Giallombardo, "which is a good explanation of why New Trier High has captured three of five years' titles in Gymnastics and Tumbling, and have the first and second individual champions of the state. Nissen Trampolines have certainly proven to me that they are built to withstand the constant use they get from New Trier students."

Nissen Trampolines are playing an important role in gymnastics and physical education programs throughout the world. They require no adjustment whatsoever . . . allow a completely clear area under the bed . . . and offer a choice of Trampoline styles to fit each individual school need.

\*REG. U. S. PAT. OFF.

5



Folds in a flash for out-of-the-way storage.



**NISSEN**  
**TRAMPOLINE**  
**COMPANY**

Cedar Rapids, Iowa, U. S. A.

**NISSEN TRAMPOLINE CO., LTD.**  
London, England



### NISSEN TRAMPOLINE CO.

200 A Avenue, N. W., Cedar Rapids, Iowa, U. S. A.

Please send new 16-page catalog, illustrating and describing Nissen Trampolines, and name of nearest dealer.

NAME OF SCHOOL \_\_\_\_\_

CITY \_\_\_\_\_

ZONE \_\_\_\_\_

STATE \_\_\_\_\_

BY \_\_\_\_\_

TITLE \_\_\_\_\_

*If it isn't a NISSEN, it isn't a TRAMPOLINE*

© 1966



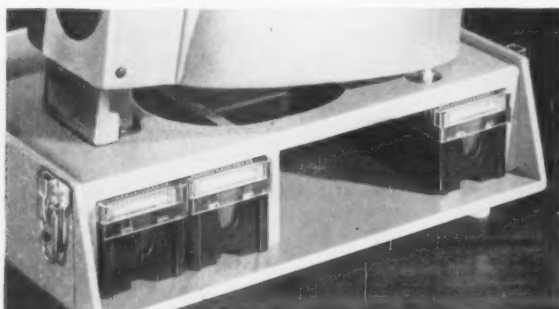
## Versatile new projector shows filmstrips or slides—adapts quickly to sound!

From the makers of Filmosound, here's the latest example of audio-visual *versatility*—Bell & Howell's new Specialist multi-purpose projector. Use it in *four* ways: for filmstrips (single or double frame) or 2x2 slides (manual or semi-automatic). Use it with sound as well! The new Specialist unit fits easily into the DuKane Recordmaster case for sound slides or filmstrips.

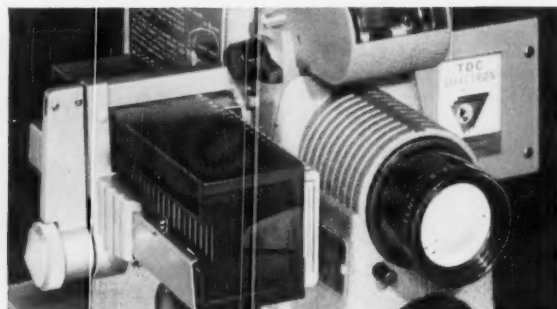
Exclusive wind tunnel action keeps the "Multi-Purpose" cooler than any other projector of its type. Another exclusive feature: a film take-up chamber that rolls

your film neatly, keeps it safe from dust and scratches.

See it in action! This new Specialist model (only \$94.95) is now being shown by Bell & Howell audio-visual dealers throughout the U.S. For further information and name of your nearest dealer, write Bell & Howell, 7155 McCormick Road, Chicago 45, Illinois.



Exclusive airflow case: the key to wind tunnel cooling—air is drawn through the bottom by a 5" fan, greatly reducing temperatures. This advanced design protects film and assures comfortable operation.



Selectron changer (optional) for semi-automatic showing—a handy tray loading unit for 2x2 slides. Once you've filed your slides in the 30-slide Selectrays, they'll be safely stored, indexed and ready for use.

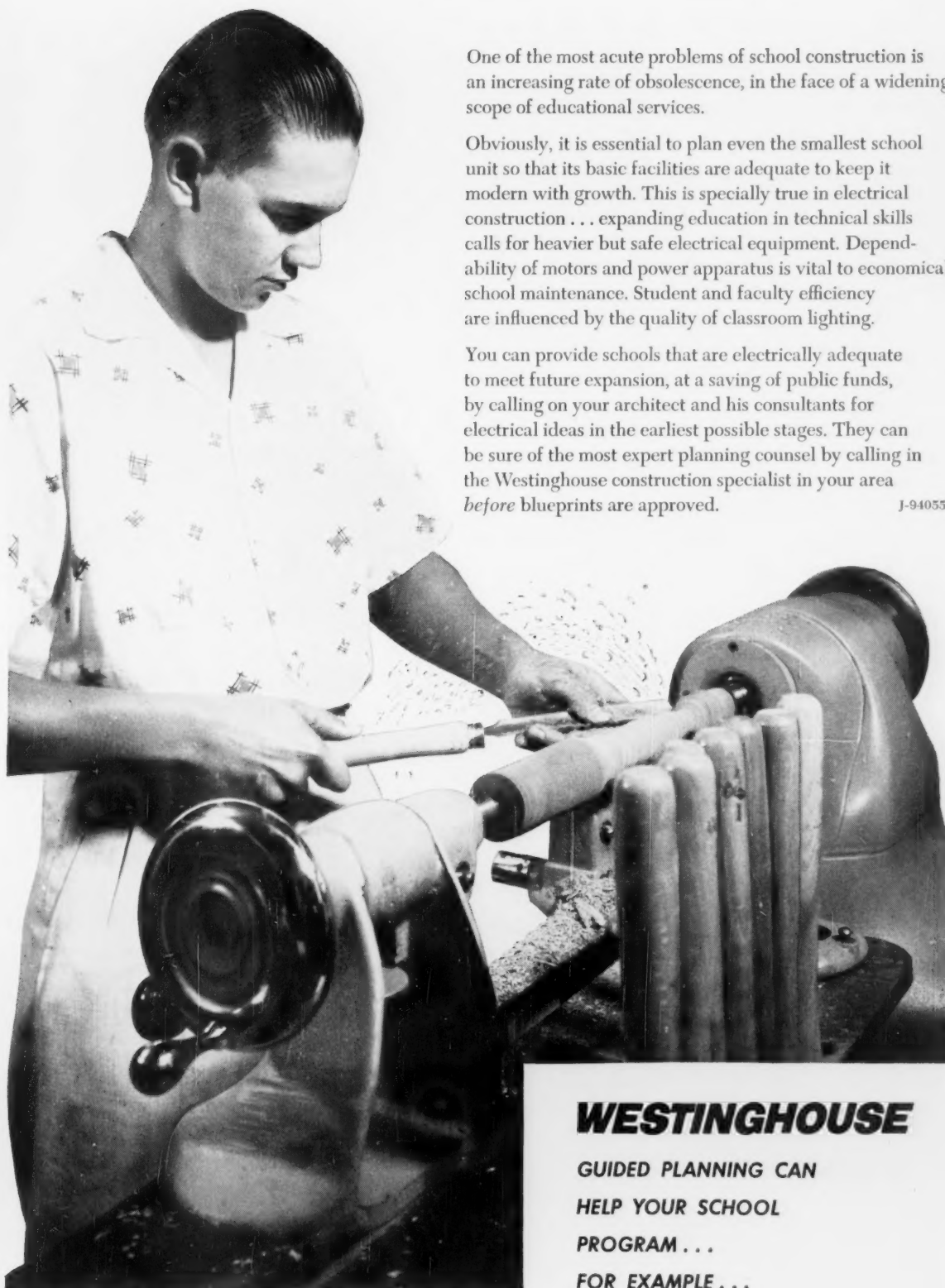
# Plan "Ageless" Schools . . . Electrically

One of the most acute problems of school construction is an increasing rate of obsolescence, in the face of a widening scope of educational services.

Obviously, it is essential to plan even the smallest school unit so that its basic facilities are adequate to keep it modern with growth. This is specially true in electrical construction . . . expanding education in technical skills calls for heavier but safe electrical equipment. Dependability of motors and power apparatus is vital to economical school maintenance. Student and faculty efficiency are influenced by the quality of classroom lighting.

You can provide schools that are electrically adequate to meet future expansion, at a saving of public funds, by calling on your architect and his consultants for electrical ideas in the earliest possible stages. They can be sure of the most expert planning counsel by calling in the Westinghouse construction specialist in your area *before* blueprints are approved.

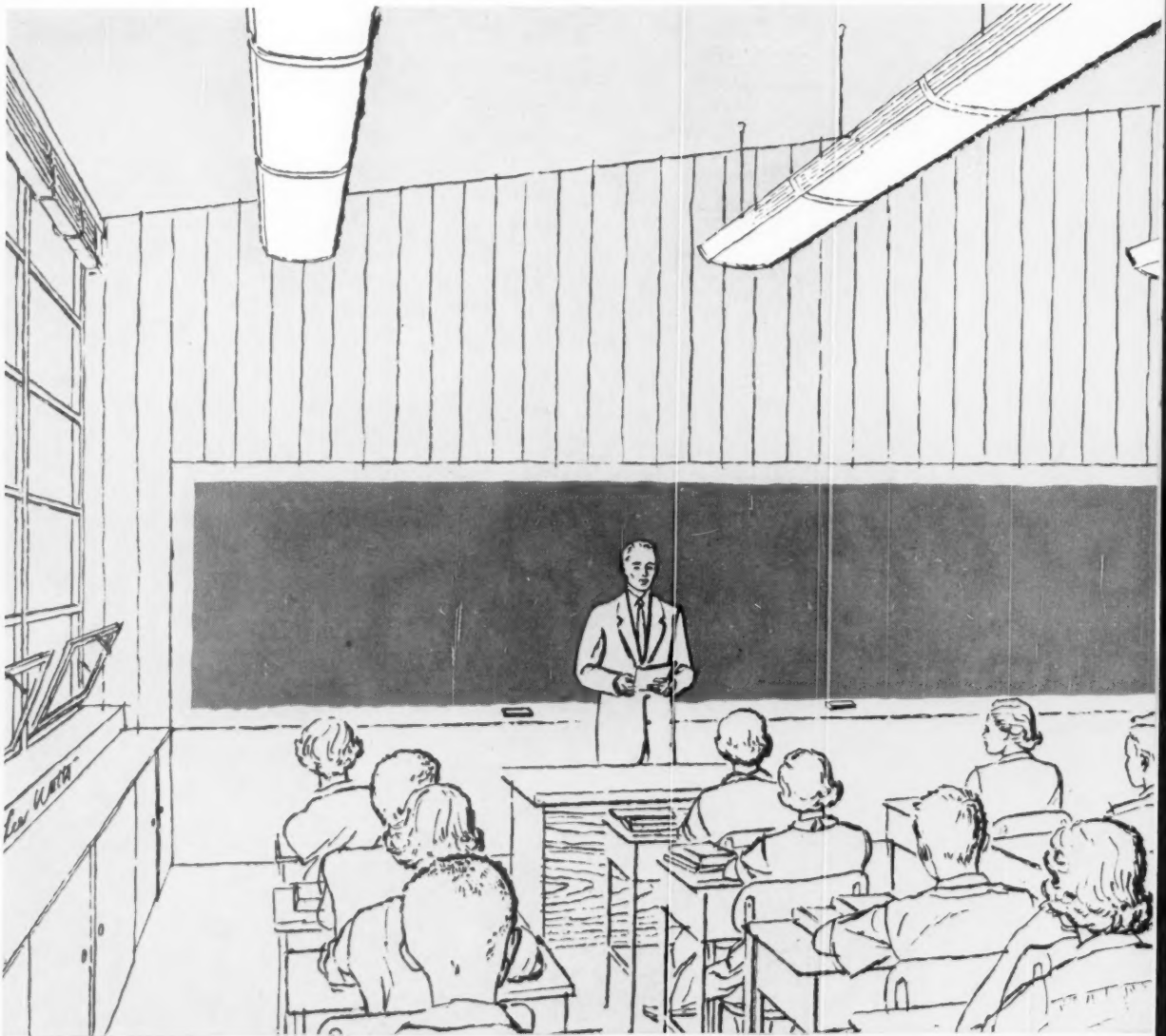
J-94055



## **WESTINGHOUSE**

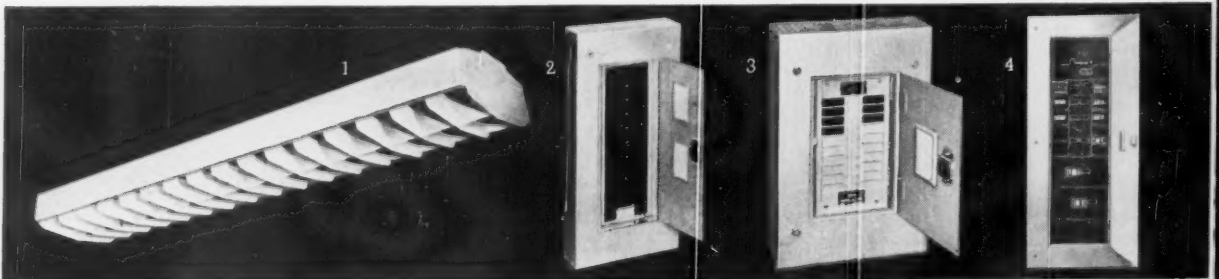
**GUIDED PLANNING CAN  
HELP YOUR SCHOOL  
PROGRAM . . .  
FOR EXAMPLE . . .**

# Cut school electrical



BELOW: 1. A popular type of Westinghouse fluorescent, for high illumination levels. 2. Westinghouse panelboard which provides maximum protection against short circuits without fuses. Service is quickly restored by reclosing circuit breakers. 3. Westinghouse Add-A-CirKit panelboard. Breakers can be added in a few minutes with simple hand tools. 4. Convertible-type distribution

panelboard which can be easily changed over to meet varying requirements, accommodates circuit breakers from 15 amps 1 pole to 600 amps 3 pole, up to 600 volts a-c. 5. Typical main switchboard for school power distribution. Internally wired and assembled at the factory. Diagram at far right is schematic of typical school power layout.





# construction costs

## WITH THESE SAFE FUNCTIONAL SYSTEMS

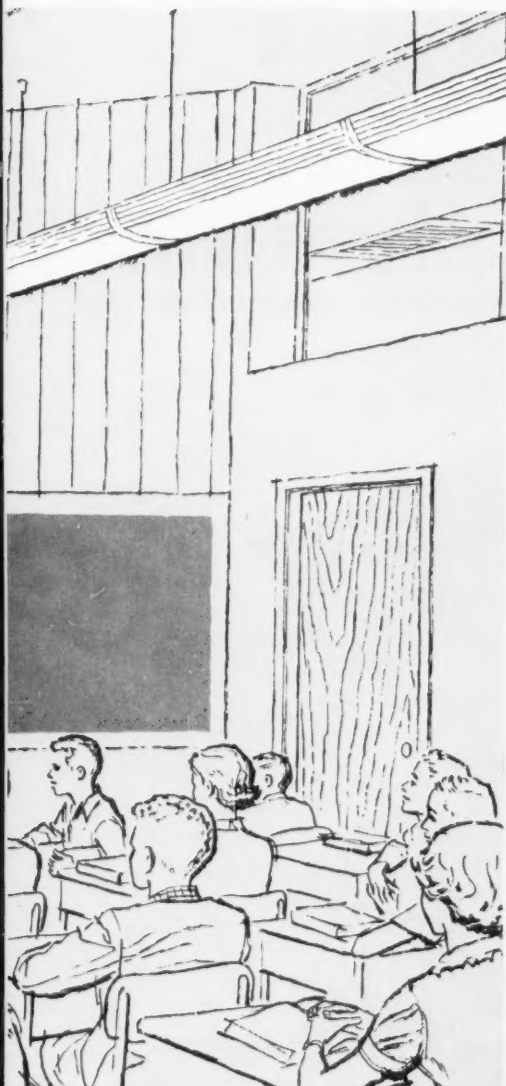
Basic "building blocks" of a Westinghouse electrical system are matched to functional requirements. Thus, each building's system includes specific characteristics, essential to the services needed in that school. They include:

*Good performance* — Sufficient stable voltage is important to modern lighting to prevent dimming and flickering.

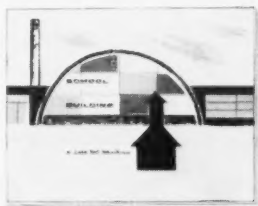
*Safety* — Automatic protection devices, completely enclosed, provide safety for both students and operating personnel.

*Flexibility* — Ease in rearranging or adding electrically operated services allows you to meet changing requirements with economy.

*Space Saving* — Compact Westinghouse equipment requires less space than old-fashioned devices, yet has the capacity to handle greater loads. J-94055-A



ABOVE: A high degree of efficiency is assured by full lighting on every desk, every wall, in classrooms lighted with Westinghouse CD fluorescent luminaires.

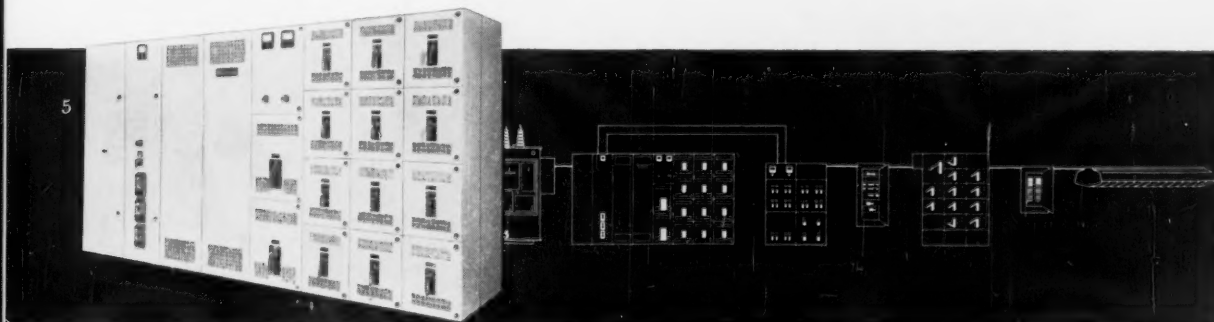


### FREE BOOK

Write for your copy of the new *Westinghouse School Planning Book*, B-6521, Westinghouse Electric Corporation, P. O. Box 868, Pittsburgh 30, Pennsylvania.

## WATCH WESTINGHOUSE!

COVER THE PRESIDENTIAL CAMPAIGN ON CBS TELEVISION AND RADIO!



"That's so I shouldn't





## The locker key problem as students see it

**Mervin Gilbert**, illustrator  
Student, Abraham Lincoln High School  
Brooklyn, N. Y. Teacher: Leon Friend

# lose my locker key ! ”

Experience taught him a locker key is a sometime thing.  
Lose it—you lose a deposit. Forget it—you can't open your locker.  
And what about his school? All that mess of issuing keys on deposit,  
duplicating lost keys, keeping a running record, refunding deposits. N. G.!

Better Yale Combination Locks—no key but a secret combination;  
no half-hearted protection but a strong, smooth-working  
lock a student can trust; no wasteful checking system, but the easy,  
saving Yale approach. You ought to look into the whole story.  
Just write to The Yale & Towne Manufacturing Company,  
Lock & Hardware Division, White Plains, N. Y.

## YALE & TOWNE



YALE NO. 515.  
Up to 10,000  
combinations.  
Rustless case.  
Aluminum finish.



YALE NO. 516.  
Like 515 but  
opens to custodian  
control key.

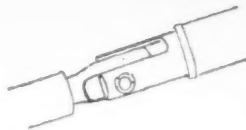
The simple solution:  
Yale\* Combination Locks

\*YALE REG. U. S. PAT. OFF.

## WHY SCHIEBER FOLDING TABLES & BENCHES ARE THE OVERWHELMING FAVORITES OF SCHOOL ADMINISTRATORS & ARCHITECTS



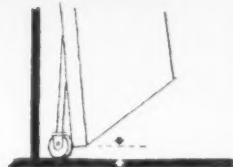
Schieber uses 800 lbs. pull test anchors, not screws, for securing tops to understructure.



Forged clevis hinges with snag-proof snap rings provide rigid, rattle-free assembly.



All joints are welded and welded in precision jigs.



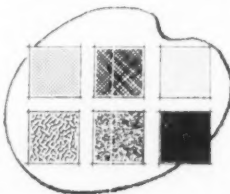
Tables and benches roll all the way into pockets on casters—do not drag last few inches.



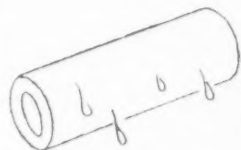
Mark-proof rubber casters protect floors.



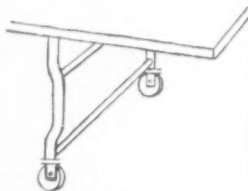
In-Wall units are counterbalanced for ease of operation.



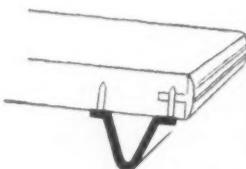
Surfaces in optional colors and patterns.



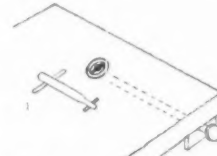
All casters equipped with permanent oil impregnated bearings—no oiling, ever.



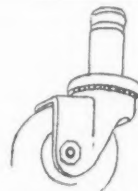
Understructure is heavy 1-inch steel tubing with .840" wall.



All edges finished with permanently bright "T" stainless steel moulding.



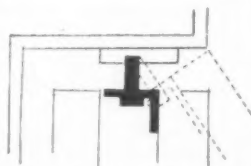
Detachable units secured in tracks with retractable roller buttons. Can't come out unless intentionally detached.



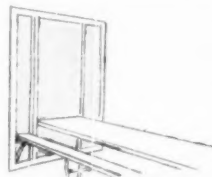
Center casters are swivel type for easy maneuvering of detached tables and benches.



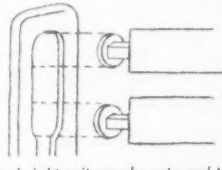
Benches reinforced by four (not two) longitudinal, formed steel stringers.



Safety catch prevents folded units falling from pocket when being operated.



Steel back in pockets adds to rigidity, eliminates contractor finishing.



Any height unit may be returned to any pocket. Welded-on (not cut out) tracks have long keyhole slots.

### Quality

top quality, is assured when Schieber is specified. Standards on materials and workmanship are based on first hand knowledge of the nature of school use and what it requires. Schieber originated the multi-purpose room (lunch room-activities area) folding tables and benches and our engineering, development and research has always led the field. As evidence, never has one penny been spent for service

on a Schieber unit except where normal wear occurred over a long period of time and the first installation ever made, 25 years ago, is still in daily use. Thousands of schools now use this equipment and more than a thousand school architects have specified it, most of them many times. Let us answer your questions or better, write for our booklet: "Twenty Questions— and Answers."



IN-WALL



PORT-A-FOLD



MOBIL-FOLD



TRANSI-FOLD



**Schieber**  
SALES COMPANY

Detroit 39, Michigan

Representatives in all areas—U. S. & Canada



# Looking Forward

## **A New Meaning for Liberty and Freedom**

ON THE 70th anniversary of the dedication of the Statue of Liberty (October 28), there is need to redefine the meaning of "liberty" and "freedom."

Seventy years ago when the people of France, through volunteer contributions, financed the construction of this symbol of their friendship for the United States, the idea of liberty was primarily a political concept. All men were to have equality in the eyes of the courts and in the exercise of the franchise of citizenship.

In the 70 years that have followed, our American concept of freedom has increased in depth and in scope. In the kind of society of which man is capable today, there shall be four other freedoms, said the late President Franklin D. Roosevelt, "freedom of speech and expression, freedom of worship, freedom from want, and freedom from fear."

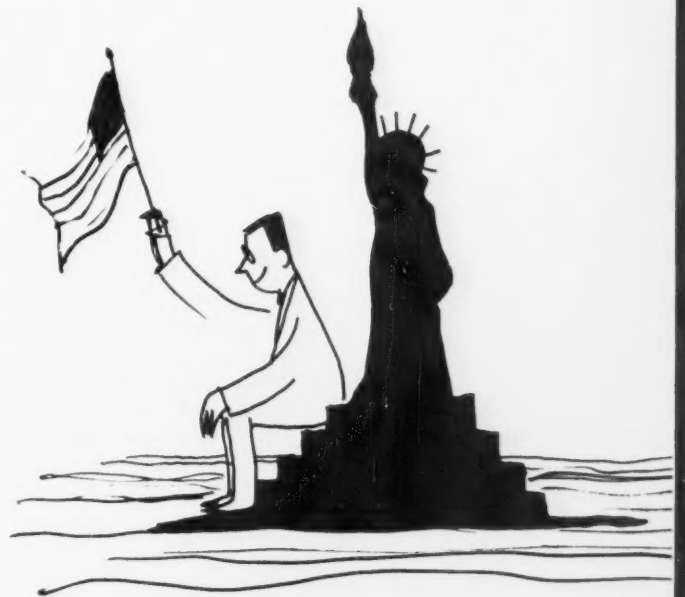
Some of our political freedoms have been abused in recent years in a period that history probably will record as the Age of McCarthyism. The natural concern of a people for its security has been exploited by politicians seeking publicity and power. The injustice of some of these inquisitorial methods has demonstrated that citizens also are entitled to freedom from false accusation. They are entitled to know the names of their accusers, and they have a right to be considered innocent until proven guilty. Likewise, they have a right to be tried in courts of justice rather than through the circulation building tactics of trial by the press.

Since May 1954, however, this nation has been challenged by the Supreme Court of this land to rise to new heights of human brotherhood. The doctrine of "separate but equal" is no longer the full meaning of liberty and freedom, said our highest tribunal.

This 70th anniversary of the dedication of the Statue of Liberty is an appropriate time for citizens of this country to dedicate this democracy to the achievement of real equality and liberty for minority groups. Our major political parties have given lip service to these ideals in their civil rights platforms. In words, at least, our political leaders are pledged to promote this deeper concept of equality.

But it took the French artist, Frederic Auguste Bartholdi, nearly 20 years to design and complete the Statue of Liberty. It may take as long, or even longer, to put into practice in this country this new meaning of democracy.

Although the Goddess of Liberty is the loftiest statue in the world, we have faith that, when her



100th anniversary arrives, she will raise the torch even higher to signal a new fulfillment of the slogan, "Liberty enlightening the world."

## **The Balance of Voting Power**

SOME four million young citizens will cast their first votes in a presidential election on November 6. Four million votes are enough to approve or defeat almost any candidate or any national proposal.

The votes of these four million young people will determine the fate of many a proposal for the extension and improvement of public education. How well have our schools prepared them to vote knowingly and wisely?

## A Mythical Myth

DEMOCRACY in school administration as practiced in a rural culture is not necessarily applicable to an urban one. This is the thesis of an article in this month's magazine by John A. Bartky of Stanford University.

Dr. Bartky argues that "the large urban industrial school district cannot be administered as if it were a small community in which everyone knows everyone else." He declares that grass-roots democracy can operate in an agrarian community but that it becomes ineffective in the city because it is not applicable.

Since the author is painting his own picture of what he calls the "Democratic Agrarian Myth," it is his privilege to determine what goes into that picture. One of the absolutes, he says, is that *all citizens* must be encouraged to *participate* in public school administration.

He pictures the agrarian community as one in which the individual "can reach reasonable solutions to problems without being involved in prejudice and conflict." Up until now, we thought that kind of blissful harmony prevailed only in Utopia. A citizen from Iowa, upon reading galley proofs of the article, commented: "Mr. Bartky certainly doesn't know what farmers are like in my community."

Conflicts derive from the personalities of a few people in a hamlet, just as much as from the pressures of labor unions, farm unions, chambers of commerce, and other groups in a big city.

In his mythical agrarian school district, the school board and the superintendent apparently are merely individuals who patiently record the consensus of the group and go through the routine of making such decisions legal.

"This agrarian concept of democracy must be dropped," he writes, "and a constitutional representative form of control must be introduced." He then itemizes some principles which should apply, such as:

"The school district is governed by a board of education duly selected through the democratic process. It is in the selection of this board that the citizen exerts his participatory rights. Any other invitation to participate is extralegal."

Nothing could be truer. But why does he assume that these principles apply only to the larger city? By law and by practice, they are just as applicable to what Dr. Bartky describes as "the agrarian community."

We think the Stanford professor takes the wrong turn in the road in his argument when he assumes that all advisory citizens groups for public education must consist of official representatives of pressure groups. School boards have learned, often to their sorrow, that this method of obtaining community participation can lead to trouble.

H. M. Hamlin and others advise that citizens committees consisting of officially named represen-

tatives of pressure groups are desirable only when a campaign is in process and the individuals on the committee need authority to commit their organizations to direct action.

Otherwise the citizens advisory group should consist of typical individuals who can represent the farmer, the housewife, the laborer, and the businessman without being the spokesman for any organized pressure group. This kind of representation can work just as well in Chicago as it can in Podunkville.

There is no denying that the larger administrative units offer less and less opportunity for the voice of the individual citizen to be heard. But it's the business of the big school system to develop better channels of communication and more effective means of interpretation.

Business seems to be able to sell its beverages and its automobiles to the masses of a big city as well as in agrarian communities. Politicians and propagandists get across their ideas to the voters of the big city. Why should it be so impossible for our public school system to develop public understanding of the purposes and achievements of its public schools?

If we can't make the democratic process work for our public schools in a big city, what hope is there for democracy in our other forms of governmental service? Let's admit that the facts of life about our big cities are discouraging and disgusting, especially the manner in which organized but small political groups can control partisan parties. But if our great nonpartisan, universal, governmental service, namely, our public schools, cannot maintain a semblance of democracy in organization and control, then what hope is there for democracy in this country?

Sociologists and political scientists have been warning us frantically that the danger to our democracy lies in the fact that more and more voters are too far removed from the people whom they choose for public office. Likewise, those in public office are too far removed from the personal influence of the average voter. It is this loss of the personal touch that leads to indifference toward the problems of government, even to the extent that a majority of voters will not bother to exercise their right to vote.

Dr. Bartky's article is as stimulating a piece of writing as you will find anywhere in the literature of education. We urge you to read it. You may agree with him, or you may interpret it—as we do—as a challenge to our larger school systems to concentrate on bringing the schools closer to the many communities which make up the big city.

## Historical Note

IN 1951 Harold E. Stassen received the American Education Award from the Associated Exhibitors of the N.E.A.

*The Editor*

The NATION'S SCHOOLS

**Wisdom of local responsibility demonstrated;  
460 school districts now have integrated  
11 per cent of Southern Negroes through diverse**

## **FORMS OF COMPLIANCE**

**GLEN ROBINSON**

*Assistant to the President and Instructor in School Administration  
George Peabody College for Teachers, Nashville, Tenn.*

**W**HEN schools opened this fall, approximately 460 school boards in the South had taken steps to desegregate their public schools. These districts enroll about 11 per cent of the Negro pupils in the South. They are in the border states of Delaware, Maryland, West Virginia, Kentucky, Missouri, Oklahoma, Texas and the District of Columbia, plus the two Mid-South states of Arkansas and Tennessee.

Integration in these 460 school districts has been the result of a variety of forces and factors. In each case, however, the manner of compliance was adapted to the particular conditions of the community. The previous article in this series described patterns of resistance. This discussion describes various forms of compliance.

### **Leadership at state level**

Many local boards of education in the border states have desegregated their schools as a result of official encouragement at the state level. WEST VIRGINIA was one of the first states to take positive action. Immediately following the May 1954 decision Gov. William C. Marland and W. W. Trent, state superintendent of free schools, both said West Virginia would abide by the decision of the Supreme Court. On June 1 Supt. Trent wrote in a letter to county school superintendents, "As segregation is unconstitutional, boards should, in my opinion, begin immediately to reorganize and readjust their schools to comply with the Supreme Court decision. . . ."

The state board of education, acting on an opinion from the state attorney general, on June 9 threw open the doors of nine state colleges to Negroes. In July, Supt. Trent said before the annual meeting of school superintendents: "Complete desegregation will come to West Virginia's public schools in a reasonable time without force and in the absence of legal action." Two months later schools opened with white and Negro children attending school together in 25 of the state's 55 counties.

Now by this fall complete desegregation is in effect in 20 counties; partial desegregation is being carried out in 15 counties, and 11 counties have no Negroes. Only three counties in the eastern Panhandle—Berkeley, Hampshire and Jefferson—remain segregated. These counties are adjacent to Virginia.

\* \* \*

In DELAWARE, forthright public statements supporting desegregation were issued by the governor, attorney general, state board of education, state Democratic party, and state Republican party *within a month* following the May 1954 decision. Despite this leadership, when school opened in September 1956 only one-fifth of the state's school districts had desegregated and less than 12 per cent of the Negro students in the state were in "integrated situations." Furthermore, southern Delaware had turned into a "battlefield of the integration-segregation conflict."

\* \* \*

After the initial decision of the Supreme Court, MISSOURI's state board of education asked the state attorney general for an opinion on the question: May school districts in Missouri abolish segregation now in light of the present decision of the U.S. Supreme Court?

The attorney general of Missouri responded with an opinion that the provisions of the Missouri constitution and statutes relating to separate schools for the races "are superseded by the decision of the Supreme Court of the United States and are, therefore, unenforceable and that school districts may at the present time permit 'white and colored children' to attend the same schools."

At least as a partial result of the encouragement of the state administration and state department of education, approximately 95 per cent of the Negro students in Missouri attended school in "integrated situations" this fall.

\* \* \*

The OKLAHOMA State Board of Education adopted a new finance plan in January 1956 that was described as the state's firm policy on integration. It is expected to save up to \$1 million in state aid funds. Since the plan was announced, 31 additional all-Negro high schools have been *abolished*, leaving 44 Negro high schools in the state. The plan provides: (1) In the future, school districts will combine the totals of white and Negro pupils in figuring the number of teachers on which they draw state aid, and

## A Mythical Myth

DEMOCRACY in school administration as practiced in a rural culture is not necessarily applicable to an urban one. This is the thesis of an article in this month's magazine by John A. Bartky of Stanford University.

Dr. Bartky argues that "the large urban industrial school district cannot be administered as if it were a small community in which everyone knows everyone else." He declares that grass-roots democracy can operate in an agrarian community but that it becomes ineffective in the city because it is not applicable.

Since the author is painting his own picture of what he calls the "Democratic Agrarian Myth," it is his privilege to determine what goes into that picture. One of the absolutes, he says, is that *all citizens* must be encouraged to *participate* in public school administration.

He pictures the agrarian community as one in which the individual "can reach reasonable solutions to problems without being involved in prejudice and conflict." Up until now, we thought that kind of blissful harmony prevailed only in Utopia. A citizen from Iowa, upon reading galley proofs of the article, commented: "Mr. Bartky certainly doesn't know what farmers are like in my community."

Conflicts derive from the personalities of a few people in a hamlet, just as much as from the pressures of labor unions, farm unions, chambers of commerce, and other groups in a big city.

In his mythical agrarian school district, the school board and the superintendent apparently are merely individuals who patiently record the consensus of the group and go through the routine of making such decisions legal.

"This agrarian concept of democracy must be dropped," he writes, "and a constitutional representative form of control must be introduced." He then itemizes some principles which should apply, such as:

"The school district is governed by a board of education duly selected through the democratic process. It is in the selection of this board that the citizen exerts his participatory rights. Any other invitation to participate is extralegal."

Nothing could be truer. But why does he assume that these principles apply only to the larger city? By law and by practice, they are just as applicable to what Dr. Bartky describes as "the agrarian community."

We think the Stanford professor takes the wrong turn in the road in his argument when he assumes that all advisory citizens groups for public education must consist of official representatives of pressure groups. School boards have learned, often to their sorrow, that this method of obtaining community participation can lead to trouble.

H. M. Hamlin and others advise that citizens committees consisting of officially named represen-

tatives of pressure groups are desirable only when a campaign is in process and the individuals on the committee need authority to commit their organizations to direct action.

Otherwise the citizens advisory group should consist of typical individuals who can represent the farmer, the housewife, the laborer, and the businessman without being the spokesman for any organized pressure group. This kind of representation can work just as well in Chicago as it can in Podunkville.

There is no denying that the larger administrative units offer less and less opportunity for the voice of the individual citizen to be heard. But it's the business of the big school system to develop better channels of communication and more effective means of interpretation.

Business seems to be able to sell its beverages and its automobiles to the masses of a big city as well as in agrarian communities. Politicians and propagandists get across their ideas to the voters of the big city. Why should it be so impossible for our public school system to develop public understanding of the purposes and achievements of its public schools?

If we can't make the democratic process work for our public schools in a big city, what hope is there for democracy in our other forms of governmental service? Let's admit that the facts of life about our big cities are discouraging and disgusting, especially the manner in which organized but small political groups can control partisan parties. But if our great nonpartisan, universal, governmental service, namely, our public schools, cannot maintain a semblance of democracy in organization and control, then what hope is there for democracy in this country?

Sociologists and political scientists have been warning us frantically that the danger to our democracy lies in the fact that more and more voters are too far removed from the people whom they choose for public office. Likewise, those in public office are too far removed from the personal influence of the average voter. It is this loss of the personal touch that leads to indifference toward the problems of government, even to the extent that a majority of voters will not bother to exercise their right to vote.

Dr. Bartky's article is as stimulating a piece of writing as you will find anywhere in the literature of education. We urge you to read it. You may agree with him, or you may interpret it—as we do—as a challenge to our larger school systems to concentrate on bringing the schools closer to the many communities which make up the big city.

## Historical Note

IN 1951 Harold E. Stassen received the American Education Award from the Associated Exhibitors of the N.E.A.

*The Editor*



**Wisdom of local responsibility demonstrated;  
460 school districts now have integrated  
11 per cent of Southern Negroes through diverse**

## **FORMS OF COMPLIANCE**

**GLEN ROBINSON**

*Assistant to the President and Instructor in School Administration  
George Peabody College for Teachers, Nashville, Tenn.*

WHEN schools opened this fall, approximately 460 school boards in the South had taken steps to desegregate their public schools. These districts enroll about 11 per cent of the Negro pupils in the South. They are in the border states of Delaware, Maryland, West Virginia, Kentucky, Missouri, Oklahoma, Texas and the District of Columbia, plus the two Mid-South states of Arkansas and Tennessee.

Integration in these 460 school districts has been the result of a variety of forces and factors. In each case, however, the manner of compliance was adapted to the particular conditions of the community. The previous article in this series described patterns of resistance. This discussion describes various forms of compliance.

### **Leadership at state level**

Many local boards of education in the border states have desegregated their schools as a result of official encouragement at the state level. WEST VIRGINIA was one of the first states to take positive action. Immediately following the May 1954 decision Gov. William C. Marland and W. W. Trent, state superintendent of free schools, both said West Virginia would abide by the decision of the Supreme Court. On June 1 Supt. Trent wrote in a letter to county school superintendents, "As segregation is unconstitutional, boards should, in my opinion, begin immediately to reorganize and readjust their schools to comply with the Supreme Court decision. . . ."

The state board of education, acting on an opinion from the state attorney general, on June 9 threw open the doors of nine state colleges to Negroes. In July, Supt. Trent said before the annual meeting of school superintendents: "Complete desegregation will come to West Virginia's public schools in a reasonable time without force and in the absence of legal action." Two months later schools opened with white and Negro children attending school together in 25 of the state's 55 counties.

Now by this fall complete desegregation is in effect in 20 counties; partial desegregation is being carried out in 15 counties, and 11 counties have no Negroes. Only three counties in the eastern Panhandle—Berkeley, Hampshire and Jefferson—remain segregated. These counties are adjacent to Virginia.

\* \* \*

In DELAWARE, forthright public statements supporting desegregation were issued by the governor, attorney general, state board of education, state Democratic party, and state Republican party *within a month* following the May 1954 decision. Despite this leadership, when school opened in September 1956 only one-fifth of the state's school districts had desegregated and less than 12 per cent of the Negro students in the state were in "integrated situations." Furthermore, southern Delaware had turned into a "battlefield of the integration-segregation conflict."

\* \* \*

After the initial decision of the Supreme Court, MISSOURI's state board of education asked the state attorney general for an opinion on the question: May school districts in Missouri abolish segregation now in light of the present decision of the U.S. Supreme Court?

The attorney general of Missouri responded with an opinion that the provisions of the Missouri constitution and statutes relating to separate schools for the races "are superseded by the decision of the Supreme Court of the United States and are, therefore, unenforceable and that school districts may at the present time permit 'white and colored children' to attend the same schools."

At least as a partial result of the encouragement of the state administration and state department of education, approximately 95 per cent of the Negro students in Missouri attended school in "integrated situations" this fall.

\* \* \*

The OKLAHOMA State Board of Education adopted a new finance plan in January 1956 that was described as the state's firm policy on integration. It is expected to save up to \$1 million in state aid funds. Since the plan was announced, 31 additional all-Negro high schools have been *abolished*, leaving 44 Negro high schools in the state. The plan provides: (1) In the future, school districts will combine the totals of white and Negro pupils in figuring the number of teachers on which they draw state aid, and



Judge William Old of Virginia, state circuit judge, suggested new weapon for South and earned title of "father of interposition."



U.S. Judge J. S. Wright struck first legal blow at new segregation laws when he invalidated Louisiana police power law.



Guy Wells was stripped of president-emeritus title at Georgia State College for Women for his alleged pro-integration remarks.



U.S. Judge Ben Moore in West Virginia suit recommended agreement, not injunction. School board met, agreed to desegregate.

(2) both white and Negro children in a school district will have the same transportation areas.

In essence this action means that, beginning with the school year 1956-57, Oklahoma school districts will have to be fairly well to do in order to support separate schools. So far, Oklahoma is the only state that has brought official "pressure" to bear upon local boards of education to cause them to desegregate public schools.

### State level discouragement

The official attitude at the state level in TEXAS following the May 1954 decision of the Supreme Court was to take no action pending the court's implementing decision. The state commissioner of education, J. W. Edgar, notified all schools to prepare for 1954-55 operation on the former segregated basis, since the Supreme Court had not written its implementing decree and the state constitution and laws required segregation. This notification was supported by a resolution of the state board of education which stated that the board was of the "unanimous opinion that it is obligated to adhere to and comply with all of our present laws and policies providing for segregation in our public school system and to continue to follow these present laws and policies until such time as they may be changed by a duly constituted authority of this state."

Moreover, Gov. Allen Shivers, who had campaigned on a promise to work for continued segregation, won an unprecedented third term nomination in August. Nevertheless, Friona school district, on its own initiative and

against the advice of the Texas Education Agency (state department of education), quietly admitted three Negro children to its white school in September 1954. This local desegregation move was not disclosed publicly until the following May.

In his first address to the new Texas legislature in January 1955 Gov. Shivers said, "I recommend that no change be made in our system of public education until—and maybe not then—the United States Supreme Court gives us its complete mandate."

By the end of July, however, a dozen school districts, including El Paso and San Antonio, had announced plans to desegregate. Meanwhile, Attorney General John Ben Sheppard warned that districts which integrated may run the risk of losing part of their state aid unless they wait for the legislature to change school finance laws. In spite of this warning, when schools opened in September 1955 about 65 Texas school districts, mainly in West and South Texas where Negroes are relatively few, had begun some degree of desegregation.

Several more school systems desegregated this fall. The town with the highest percentage of Negroes was Seguin, which has 665 Negro and 2440 white pupils.

\* \* \*

In MARYLAND the city of Baltimore is another example of where local initiative resulted in desegregation despite discouragement at the state level. Immediately after the May 1954 decision of the Supreme Court, Maryland's attorney general, Edward Rollins, said that "nothing can be accomplished

until next year following the court's final ruling." On May 26 the state board of education adopted a statement which said, "The laws of Maryland specifically provide for segregation in the public schools. . . . In view of this law requiring segregation, no program of integration can be put into effect until the decision of the Supreme Court becomes final and an effective date is set by the Supreme Court."

The Baltimore Board of School Commissioners, with no public discussion, on June 3 adopted unanimously a resolution which said, "In view of the decision of the Supreme Court regarding our public schools, and in view of an opinion given us by the Baltimore city solicitor . . . it is the opinion of this board that our system should be conformed to a nonsegregation basis to be in effect by the opening of schools in September of this year."

### Local approaches

Some local boards of education in the Border South have decided to desegregate their public schools as a result of influences from outside the community, and some because of influences inside the community, but so far most of the boards that have desegregated have responded to a combination of outside-inside influences.

**Court decrees have wide influence.** About six school systems have desegregated public schools as a direct result of legal actions amounting to federal court decrees. These include Wilmington, Del.; Topeka, Kan., and the District of Columbia (which were



James P. Coleman, governor of Mississippi, headed southern delegates' caucus to Democratic convention; he helped draft platform.



Luther Hodges, governor of North Carolina, called a special session of legislature to vote for a referendum on state tuition.



Thomas J. Pearsall of North Carolina advisory committee on education helped on state tuition grants, local option law.



Judge Mac Swinford's ruling that Negro pupils be admitted in Adair County led many Kentucky districts to begin integration.

parties in the original Supreme Court cases), plus Kirkwood, Mo.; Anderson County, Tennessee, and Adair County, Kentucky. Several other districts have been ordered to desegregate, but at the time this article was written white and Negro students had not yet attended classes together. Although court decrees directly resulting in desegregation have been few in number, their effects have been widespread. The Adair County case is an example.

Between the 1954 and 1955 decisions of the Supreme Court the policy on desegregation at the state level in KENTUCKY was to recognize the validity of the decision but to wait for the implementing decree. The decree came, but only random desegregation took place as schools opened in the fall of 1955, involving about 10 per cent of Kentucky's school-age Negroes.

A number of districts were planning integration, but many districts were waiting. They seemed to be awaiting the decision on Kentucky's first school integration case—the Adair County (Willis v. Walker) case. In December 1955, Federal District Judge Mac Swinford ruled that Negro pupils should be admitted to the Adair County high school in February 1956 and that elementary schools be desegregated the following September.

Apparently the decision in this case was a major factor in stimulating hesitant school boards to speed up desegregation plans. According to persons in the state department of education, "nearly every" school district was expected to begin the 1956-57 school year with some desegregation.

**Going to the brink.** At least seven boards of education have agreed to



United Press Photo

Three segregation leaders (left to right): Amis Guthridge of Little Rock, Ark.; Herbert Brewer of Hoxie, Ark., and James D. Johnson of Crossett, Ark. They are waiting for the federal court to open a hearing at Little Rock on a complaint filed against them by Hoxie school district officials.

desegregate on the brink of a court battle. In September 1954 the school board for Greenbrier County, WEST VIRGINIA, reversed its desegregation policy as a result of near violence and student picket lines. The N.A.A.C.P. brought suit against the board. In an October 1955 pre-trial hearing, Federal District Judge Ben Moore took the position that segregation could be ended either by injunction or by agreement of the parties to the suit. The judge recommended that desegregation begin in January and be completed in September 1956. As for the court's injunction power, he declared: "Government by injunction is one of the worst of all evils." As an alternative, he continued, a meeting of minds could achieve the same results.

Immediately, the school board convened in an executive session; after four minutes it returned to the courtroom and announced it had decided to comply "both in the letter and the spirit of the recommendation."

The Greenbrier agreement apparently set off a chain reaction. During the next two months the school boards of Mercer, Summers and Raleigh counties decided to desegregate just short of a court battle.

**For economy and convenience.** Dalton Coffey, superintendent of Priona school district—the first district in TEXAS to integrate its Negro pupils (the first three Negroes to apply for an education) into white schools—said in reference to the action: "We could have spent about \$10,000 and

had a separate place for the Negroes. We thought if we had 12 to 20 Negroes we might provide separate classrooms. But it would cost a lot of money."

In ARKANSAS, Fayetteville was one of the first districts in the South to integrate white and Negro pupils in public schools. Supt. Wayne White said it cost about \$5000 to send Negro students to high schools outside the district. "Last year we finished the school year with only \$159 in the bank," he continued. "Segregation was a luxury we no longer could afford."

**Study committees as pace setters.** A number of boards of education have named study committees to assist them in formulating policy regarding the Supreme Court decision. At least 60 such committees have been reported in Kentucky, and all but one of the county boards of education in Maryland have appointed study committees. The effectiveness of these committees in paving the way for desegregation in the community varies greatly.

In Montgomery County, MARYLAND, which contains suburbs of Washington, D.C., the school board appointed a 19 member citizens advisory committee on desegregation. There was full and lengthy discussion throughout the county concerning ways to desegregate. The community became confused and divided over what was the most practicable way to desegregate its schools. The committee, after lengthy deliberation, submitted to the board a majority report accompanied by four minority reports. The school board finally adopted a desegregation plan quite different from those that had been proposed by the committee. This plan was put into effect against considerable community opposition.

In near-by Prince George's County, which like Montgomery County is a suburb of Washington, the board of education appointed a 22 member study committee. To avoid a repetition of what happened in Montgomery County, the Prince George's board unanimously passed the following resolution in setting up the committee:

"Be it resolved that members of the board of education, its employees, or any member of the fact finding committee on desegregation be directed that they are not to appear before citizens groups or other interested persons nor at any time to discuss the work of this committee nor how

desegregation in Prince George's County will be designated until such time as the board of education is prepared to state its policy on this matter."

The Prince George's board adopted a gradual desegregation program that followed in essential details the recommendations of the study committee. Desegregation met little opposition.

**Unilateral action by school boards.** Several school boards have moved without the assistance of official lay study committees to desegregate public schools. Baltimore and the District of Columbia are among the systems that have desegregated in this manner.

In ARKANSAS, the Hoxie Board of Education announced on June 25, 1955, that schools would be desegregated, beginning with the summer

#### S.E.R.S. HEADQUARTERS, NASHVILLE



The factual data in this and the preceding articles were obtained primarily from the files of the Southern Education Reporting Service, Nashville, Tenn. S.E.R.S. is an objective, fact finding agency established by southern newspaper editors and educators with the assistance of the Fund for the Advancement of Education to provide accurate, unbiased information to persons interested in developments in education arising from the U.S. Supreme Court opinion declaring segregation in public schools unconstitutional. The S.E.R.S. reports current educational happenings in the South in its monthly newspaper, *Southern School News*. The author wishes to acknowledge and commend the services of the S.E.R.S.

term on July 11. The decision of the board was unanimous. There was no public discussion and little community preparation prior to the board's decision. The board simply announced its decision and gave three reasons for desegregating: (1) It was costly to

transport the district's 10 Negro high school students to a Negro high school in Jonesboro 23 miles distant. (2) The United States Supreme Court had declared public school segregation unconstitutional. (3) The board considered desegregation right in the sight of God.

Twenty-five Negro students were enrolled in white elementary and high schools, which had about a thousand white students. Opposition to desegregation quickly mounted, and on August 19 the board closed the summer session two weeks early "in order to be able to give more careful consideration to the solution of the present school problem." (The schools in the district operate on a split fall semester to permit pupils to help pick cotton.)

A combination of local and non-local pro-segregation pressures became so strong that the board of education asked for and received a permanent federal court injunction restraining pro-segregationists from interfering in school operations.

The situation was much different in Fayetteville, Ark. There the board of education announced, a week after the May 1954 decision of the Supreme Court, that it would integrate its nine Negro high school students in September with about 500 white students in the high school. The decision was accepted and executed with almost no protest.

#### Plans of desegregation

Deciding *how* and *when* to desegregate public schools has often proved to be a problem of equal or greater magnitude than the problem of deciding *to* desegregate. Most of the plans or methods that have been used to desegregate public schools fit into the following categories:

**Step-by-step desegregation.** As desegregation has occurred along the border of the South, school districts have generally employed some type of a step-by-step plan for integrating white and Negro pupils. In MISSOURI, St. Louis spread its desegregation program over the span of a year. Junior colleges and special schools were desegregated in September 1954, high schools in February 1955 and elementary schools in September 1955.

Supt. Philip Hickey said: "One reason for making the transition by steps over the period of a year was that considerable detail work needed to be done in such matters as drawing of





Kennedy in Arkansas Democrat



Nashville Banner, Nashville, Tenn.

### Not off the assembly line yet

new school district boundaries, assignment of teachers and pupils and other personnel, transfer of books and materials, and transmission of information to parents. To do this work properly required time.

"Another reason was that a major portion of administrative attention could then be concentrated on the particular groups of schools being integrated, thus ensuring a more thorough supervisory job. It was strongly believed that integration of the first groups of schools should be accomplished in such a manner and in such an atmosphere as to create a proper climate for the entire process, and also to serve as models for the groups of schools which were soon to be integrated."

**From the top down.** Beginning desegregation from the top down is rather typical of most patterns of compliance in the border states, especially in school districts where the proportion of Negroes is small. A survey made by the Missouri state commissioner of education showed that about 54 of the first hundred districts to desegregate in MISSOURI began at the high school level, while only nine began at the elementary level. The remainder either desegregated in Grades 1 to 12 simultaneously or continued to maintain both white and Negro schools on an optional transfer basis.

In ARKANSAS Federal Judge John E. Miller in August 1956 upheld the plan of gradual integration made by the Little Rock School District in a suit brought by N.A.A.C.P., recognizing it as a bona fide effort to comply with the Supreme Court decision.

Supt. Virgil Blossom of the public schools said that the proposed integration program would be carried out in three phases: (1) in the senior high school when a new building is completed (possibly September 1957); (2) in the junior high school, and (3) in the elementary grades.

Mr. Blossom declared that there is no "definite target date" for complete integration, but Judge Miller's decision said that integration would be complete by 1963.

### Starting with elementary grades.

As desegregation moves farther South, where there is a higher concentration of Negro population and where community sentiment is stronger, there seems to be an increasing amount of interest in step plans for starting integration in the elementary grades. Several counties in MARYLAND with "southern characteristics" have recently begun desegregation in the lower elementary grades. Hopkins County, KENTUCKY, has begun a 12 year integration process, beginning at the first grade and progressing one grade each year. In TENNESSEE, Nashville's

board of education is reported to be considering a step plan to begin integration in the first grade.

Although most districts have desegregated in stages, several districts along the border have desegregated elementary and secondary schools simultaneously. Baltimore and Louisville, Ky., are among the school systems that desegregated in this manner.

**Token integration.** The board of education of Queen Anne's County, MARYLAND, brought a token end to segregation in the fall of 1955 by issuing this statement: "No child will be denied the privilege of attending any school unless it is administratively not practical because of overcrowded conditions, transportation or other valid reasons." The board also announced that it would continue separate school bus systems for white and Negro pupils, and, because all pupils were already registered, each person transferred would have to be approved individually.

The board said that a "comparable" school system for white and Negro children had been developed. Apparently in an effort to reassure pro-segregationists the board added, "The school program will continue to be developed in the same manner as it now exists."

**Transfer application.** Several counties in Maryland are using a transfer

### Time . . .

application method of integrating Negro pupils into former white schools. Talbot County, for example, announced that it would begin integration this fall in the first three grades by allowing Negro pupils to apply on an individual basis for transfer to white schools. The board of education said that it "reserves the right to refuse any transfer for reasons good and sufficient unto itself." Forty-two applications for transfer were received out of a Negro enrollment of about 1270 pupils. About half of these were seeking admission to white high schools and were turned down. All eight applications received for the first grade were reported to have been accepted, but the academic standings of those already in school were "scrutinized thoroughly" before six were admitted to the second and third grades of white schools.

Anne Arundel County, which has adopted a similar policy for integrating the first three grades this fall, is reported to have accepted nearly all of its 45 applications for transfer of Negroes to white schools in the Annapolis area.

The Harford County Board of Education in announcing its transfer application plan said in an advertisement

in the county press: "While the board has no intention of compelling a pupil to attend a specific school or denying him the privilege of transferring to another school, the board reserves the right during the period of transition to delay or deny the admission of a pupil to any school, if it deems such action wise and necessary for any good and sufficient reason."

Somerset County advertised in the county press in the summer of 1956 that it would receive requests for permission for children to transfer to schools they would not normally attend. Somerset has a high percentage of Negroes.

**Freedom of choice.** The city of Baltimore had never had school attendance areas or zones in the sense that the words are commonly used in school matters. Children had the right to be admitted to any school for their race in the city, provided the school of their choice was not already overcrowded. On June 10, 1954, the school board announced a desegregation policy that "all of the standards and criteria . . . with respect to the admission of pupils to schools, grades or curriculums shall continue in force except

that the race of the pupil shall not be a consideration." As a result the doors of all schools in all parts of the city, except in overcrowded areas, were thrown open on a freedom of choice basis to pupils of both races in September 1954.

Former rules regarding transfer from one school to another were continued. Transfers because of changes in residence were automatically approved. Transfers for other reasons were approved by the two principals involved or by the appropriate assistant superintendent, subject to considerations, such as the relative classroom sizes in the two schools.

The Baltimore school population is about 41 per cent Negro, but after the freedom of choice plan had been in operation two years only 66 of its 165 schools enrolled both white and Negro pupils. During the first year of desegregation about 3 per cent of the total Negro enrollment entered what had formerly been all-white schools; 7.3 per cent entered the second year.

**Compulsory attendance areas.** The DISTRICT OF COLUMBIA used a phased process in moving from a system of biracial compulsory attendance areas

(Text Continued on Page 50)

## CIVIL RIGHTS PLANKS OF MAJOR POLITICAL PARTIES

### Democratic

The Democratic party is committed to support and advance the individual rights and liberties of all Americans. Our country is founded on the proposition that all men are created equal. This means that all citizens are equal before the law and should enjoy equal political rights. They should have equal opportunities for education, for economic advancement, and for decent living conditions.

We will continue our efforts to eradicate discrimination based on race, religion or national origin. We know this task requires action, not just in one section of the nation, but in all sections.

It requires the cooperative efforts of individual citizens, and action by state and local governments. It also requires federal action. The federal government must live up to the ideals of the Declaration of Independence and must exercise the powers vested in it by the Constitution. . . .

The Democratic party pledges itself to continue its efforts to eliminate illegal discriminations of all kinds, including full rights to vote, full rights to engage in gainful occupations, full rights to enjoy security of the person, and full rights to education in publicly supported institutions.

Recent decisions of the Supreme Court of the United States, relating to segregation in publicly supported schools and elsewhere, have brought consequences of vast importance to our nation as a whole and especially to communities directly affected. We reject all proposals for the use of force to interfere with the orderly determination of these matters by the courts.

The Democratic party emphatically reaffirms its support of the historic principle that ours is a government of laws and not of men; it recognizes the Supreme Court of the United States as one of the three constitutional and co-ordinated branches of the federal government, superior to and separate from any political party, the decisions of which are part of the law of the land. . . .

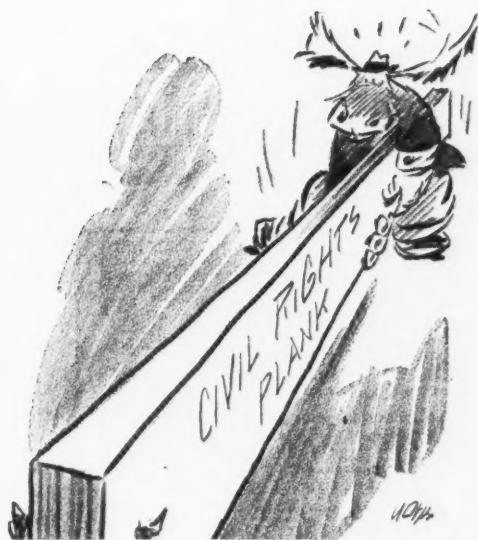
### Republican

The Republican party has unequivocally recognized that the supreme law of the land is embodied in the Constitution, which guarantees to all people the blessing of liberty, due process and equal protection of the laws. It confers upon all native-born and naturalized citizens not only citizenship in the state where the individual resides but citizenship of the

United States as well. This is an unqualified right, regardless of race, creed or color.

The Republican party accepts the decision of the U. S. Supreme Court that racial discrimination in publicly supported schools must be progressively eliminated. We concur in the conclusion of the Supreme Court that its decision directing school desegregation should be accomplished with "all deliberate speed" locally through federal district courts. The implementation order of the Supreme Court recognizes the complex and acutely emotional problems created by its decision in certain sections of our country where racial patterns have been developed in accordance with prior and longstanding decisions of the same tribunal.

We believe that true progress can be attained through intelligent study, understanding, education and good will. Use of force or violence by any group or agency will tend only to worsen the many problems inherent in the situation. This progress must be encouraged and the work of the courts supported in every legal manner by all branches of the federal government to the end that the constitutional ideal of equality before the law . . . will be steadily achieved.



Robert York in Louisville Times

*Through the hall without hitting anybody*



Robert York in Nashville Banner

*The long and the short of it!*

## Marks Turning Point in Segregation Conflict

THE SOFT TONE of the civil rights planks adopted by both the Republicans and the Democrats may mark a turning point in the school desegregation conflict. Both parties have decided that political expediency calls for a philosophy of moderation. Both groups are guessing that the majority of Americans do not side with either extreme in the desegregation controversy. In both platforms, the denouncement of "force" seems to imply a conviction that desegregation is better accomplished through *working with* people rather than *forcing* people.

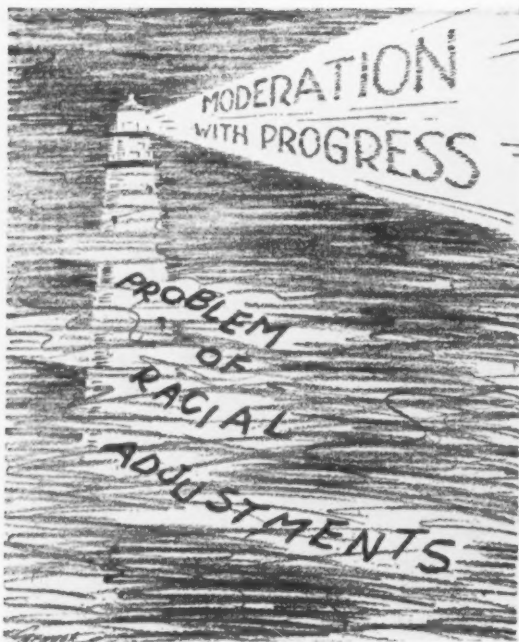
The Democratic civil rights plank turned out to be a well balanced fence-sitting statement. The Republican plank was only slightly tilted toward the "northern liberals." The G.O.P. version was viewed as only "a thin shade stronger" than the Democratic, in a joint statement issued in San Francisco by Roy Wilkins, executive secretary of the National Association for the Advancement of Colored People, and Joseph Rauh, chairman of Americans for Democratic Action.

The moderate action on civil rights by both political parties seems to have lessened, at least for the moment, demands of extreme pro-integrationists for ignoring patterns of thinking in many

southern communities. The same policy of moderation seems to be quieting some of the fears in the South that extreme pro-integration forces, with the support of nonsouthern sentiment, might have the power to ride roughshod over the deep-seated mores and customs of many Southern communities.

But are these modified platforms only words? Will extremists in both the North and South really change their goals and their programs of action? It's doubtful. Events in much of the South since the adoption of both platforms continued to reflect opposition to desegregation, with many local and state political platforms still being based upon emotional campaigns to hold the line against desegregation.

And how will the Negroes vote? Has the "hit-nobody" platform of the Democrats pacified the Negro? Has "a tint stronger" Republican version made a favorable impression on the large blocs of Democratic Negro voters in the North? The next few weeks will show the trends that will affect the November presidential election. The author of this series of articles will report next month on the political scene and its relationships to segregation in public schools in the South.



Carmack in Christian Science Monitor

### The indispensable beacon

to a system of integrated compulsory attendance areas. The process extended over a year. First, attendance areas were redrawn, but when school opened in September 1954 these applied only to pupils new to Washington schools and to those who moved from one part of the city to another. Second, about two weeks later, high school students were given the option of remaining in the school they were attending or transferring to the school newly zoned for their neighborhood. Third, at mid-term all junior high graduates were required to enter the high school nearest their home. Fourth, in September 1955 junior high and elementary school pupils were given the option of transferring to the school in their attendance zone or remaining in the school they formerly attended until they graduate, when they must attend their neighborhood school.

**Flexible transfer.** In announcing that the schools of Louisville would be desegregated beginning in September 1956, the board of education of that KENTUCKY city said the change would be "complete" at all levels of the school system—kindergarten

through adult classes. The board stated: "The entire area of the Louisville school district will be redistricted without regard to race. . . . There shall be no gerrymandering or other establishment of unnatural boundaries. . . . If two or more schools are close together, or for other reasons it seems wise, a single district may be established for them and parents may be permitted to choose freely between or among them within the capacities of the respective schools."

After the new district lines were established, a card was sent to each child's parents explaining the desegregation process and stating the school to which the child was assigned. For parents who were unhappy about their child's assignment, the cards provided write-in space for the first, second and third choices of schools the parents preferred their child to attend. In cases where there were more requests for transfers than could be granted, decisions were made in accordance with these choices.

Administrative aides to Supt. Omer Carmichael said that the great majority of parents did not request transfers



Jack Hamm from Religious Drawings, Inc.

### Deserving a place

and that satisfactory transfers were made for virtually all persons who requested them.

### Justified responsibility

The thing that seems to be emphasized by these patterns of compliance with the Supreme Court rulings is the diversity of ways various boards of education have moved to desegregate schools. Approaches to desegregation that are acceptable to one school district seem unpromising to another. To be sure, some school boards have followed the leads of other boards, and some have attempted to avoid the misfortunes of others. With few exceptions, however, each local board has decided if, how and when its schools would be desegregated. And, like fingerprints, these decisions and their outcomes reflect the peculiar characteristics of the individual community.

Perhaps the diversity of approaches to desegregation serves to underscore the wisdom of that portion of the Supreme Court's ruling which placed primary responsibility on school authorities for "elucidating, addressing and solving these problems." #

## Next Month: What the Current Scene Portends for Desegregation





Photo, courtesy of public schools, Elizabeth, N.J.

A student greets a substitute teacher in the principal's office before taking her to the classroom and introducing her.

## ***For Substitutes Use Your Better Teachers***

***Pay them more, too, and  
provide a travel allowance***

**JAMES G. HARLOW**

*Associate Professor of Education, University of Chicago*

**JOHN H. M. ANDREWS**

*Staff Associate, Midwest Administration Center, C.P.E.A.*

**T**ODAY'S use of part-time employees as substitute teachers is administratively about as efficient as the horse and buggy is in transportation. Current administrative practice requires substitutes to face new schools, unknown colleagues, strange rules, unfamiliar curriculums, and pupils with whom they are totally unacquainted. With little or no time for mental or emotional preparation, the substitute teacher hurriedly stacks the breakfast dishes and rushes off to school, there to be greeted by pupils who, in addition to being unknown to the teacher, are in at least something of a holiday mood.

Little can be accomplished educationally under these conditions; the administrative clumsiness of the scheme in use makes it extremely costly; the educational cost to the district is exorbitant. Administrative necessity is no longer a suitable defense for continuation of so nonproductive an arrangement, for the size and persistence of the demand for substitutes in today's large school districts have long since moved this problem from the emergency category in which it was originally conceived.

Consider the term "substitute teacher." It clearly connotes a regular teacher who isn't supposed to be absent. When the teacher of yesterday's

little red schoolhouse became ill, there was an emergency. Calling in a local housewife who had done some teaching was an acceptable emergency solution. Today's districts, however, employ hundreds and sometimes thousands of teachers. In these systems teachers are expected to be absent, and the "fringe benefit" arrangements of sick leave and tenure make absence much simpler for the present-day teacher.

In fact, the number of teachers who will be absent on any given day can be predicted with fair accuracy. Several studies of teacher absence have been made, and they uniformly find stable averages—average annual short-term absence per teacher is between one and two weeks; for large systems this individual absence rate is pooled into an approximate absence rate of 10 per cent per day. There are variations by season, of course, and contagious diseases produce important fluctuations.

But, by and large, replacing absent teachers is clearly no longer an emergency operation in a system of any size. It is a problem to be met each day, planned for, staffed and organized into the school operation like any other recurrent need. Failure to carry out these administrative responsibilities to meet educational objectives is what

makes current substitute teacher administration a horse and buggy operation.

Absences of the order of 10 per cent—from eight to 15 teachers per day in a 100 teacher system—create a demand for a new category of teachers. Far from being the usual substitutes, however, the teachers in this category should be among the most flexible, most congenial, and best trained people the system can afford. To function effectively in the absence of a regular teacher, these teachers should be thoroughly familiar with the schools of the district. They should be accepted members of the district faculty and should participate fully in regular faculty activities. They must know school organization, district courses of study, evaluation processes, and district marking and promotion policy. They should be people of marked ability to achieve rapport with pupils on very short acquaintance.

Teachers with these qualifications clearly would be drawn from among the ablest teachers in any system and would of necessity be regular full-time, tenure holding faculty members. They probably would require some salary advantage over teachers who do not move about, and they probably should be provided with reasonable travel allowances.

Teachers selected in this manner could not possibly be called "substitutes" and probably could not be called even by the title popular in the studies, "permanent substitutes." "Reserve teacher" would be a much more dignified and appropriate title and would more nearly approximate their function, for this group of people would not "substitute" for anyone. They would be regular instruments of district educational purpose, selected for and experienced in their specialized task of carrying on the basic activity of the district under the most difficult conditions. Their function, in brief, would be to prevent the educational loss occasioned by the unpredicted absences of individuals in critical spots.

There are many advantages to such an approach. The status of the reserve teachers, derived both from the nature of the position and from the quality of the incumbents, would help to build in both pupils and faculty a whole new set of attitudes to replace those which now make worth-while teaching difficult for even a good part-time substitute.

#### DEVISE SPECIAL TECHNIQS

Reserve teachers, as a specialized professional group, would undoubtedly develop their field, devising special technics of teaching and classroom management for their unique requirements. In general, the period of absence of the regular teacher could be expected to change from an instructional doldrum to a stimulating trade wind. Reclaiming, each year, one to two weeks of instructional time for each child is singularly important in an enterprise which exists to educate children.

In addition to the instructional benefits, a reserve teacher group would eliminate or minimize many of the cumbersome, inefficient administrative aspects of the usual substitute arrangements. The superintendent's problem of daily assignment would become relatively simple, and his problem of substitute recruitment would disappear. Gone, also, would be the principal's problems of late arrival and orientation of substitutes, of extra disciplinary cases, and of the anxiety occasioned by dependence upon a relatively untried person.

Because of daily and monthly fluctuations in the frequency of teacher absences, reserve teachers might not be used exclusively. The minimum reserve teacher staff could be that re-

quired by the lowest daily absentee rate predicted for the year. A part of the present substitute teacher list could perhaps be retained to fill the remaining vacancies. Only the best of the present substitutes would be required. Incidentally, the new attitudes developed in the schools toward reserve teachers would transfer, at least in part, to the remaining substitutes. Or a district could set up a more generous corps of reserve teachers, using their nonteaching time in curriculum improvement, research of various kinds, or in other administrative staff work as needed.

The advantages of reserve teachers are not to be had without some sacrifices. If baby sitting is all that is desired, reserve teachers would be more



The traditional substitute hurriedly stacks breakfast dishes and rushes off to a class.

expensive than substitute teachers. For that matter, baby sitters cost less than the usual present-day substitute. On the other hand, reserve teachers would undoubtedly produce more educational gains per dollar spent than do the usual substitutes. The reserve teachers would be missed as classroom teachers, but the impact of their excellent teaching would be much more widespread. Too, in some areas, it might be difficult to find the extra classroom teachers needed to replace those selected to be reserve teachers. Many school systems are finding, however, that the teacher shortage is more apparent than real because of the return of large numbers of qualified former teachers. The sacrifices involved, therefore, turn out to be of two kinds: those which are only apparent sacrifices and those which inevitably accompany any improvement in program.

Details of organizing reserve teacher services would vary, of course, from

one school system to another. Two plans are easily visualized: a centralized administration and a decentralized administration. The former would locate the corps of reserve teachers in the office of the superintendent; the latter would assign small numbers of reserve teachers to particular schools or groups of schools. A judicious combination of these two plans of organization might prove to be superior to either one.

#### IGNORE RESEARCH

As long ago as 1931, an editorial in *The NATION'S SCHOOLS*<sup>1</sup> strongly recommended the use of "permanent substitutes" to reduce the educational inefficiencies of the part-time substitute system. All of the major research work<sup>2</sup> treating substitute teacher services have concurred in this recommendation. During the intervening years, surveys have suggested that these recommendations have been materializing in practice, but a closer look shows that this is not at all the case. The title "permanent substitute" is used for all sorts of spurious purposes. It includes, for example, permanent teachers filling long-term vacancies and regular classroom teachers for whom the title permits circumvention of salary schedules, pension responsibilities, and tenure or certification regulations. Only rarely are "permanent substitutes" used for filling day-to-day absences of teachers. The unanimous recommendation of major research workers continues to be ignored.

Teaching strange classes for short intervals is the most difficult teaching job in the schools. If anything much more than baby sitting is to be accomplished, the teachers must be not merely as good as the regular teachers; they must be much better. They must have experience varied in both grade level and subject matter. They must have personal qualities which lead very quickly to rapport with the pupils. They must be regular employees retained by the district.

The substitute teacher program was a good solution to a problem which has long since changed. It is long past time to move the substitute list to an honored place in our memories beside the horse and buggy. #

<sup>1</sup>"When a Teacher Becomes Ill, Who Shall Take Her Place?" *The Nation's Schools*, 8:74 (July) 1931.

<sup>2</sup>A short bibliography will be supplied by the authors upon request.

Science is one of the subjects taught in the summer workshop held in a public elementary school at Highland Park, Ill. In 1956 the class concentrated on the study of trees, taking trips by school bus to various homes and parks to find unusual trees.



**Public school facilities provide setting for**

## ***Self-Supporting Summer Program***

**An interview with RAY J. NAEGELE**

*Principal, Ravinia School, Highland Park, Ill.*

**By DOLORES E. HENNING**

**N**OW that summer is over, District 108 at Highland Park, Ill., is evaluating its 1956 summer program for school children and making plans for next summer.

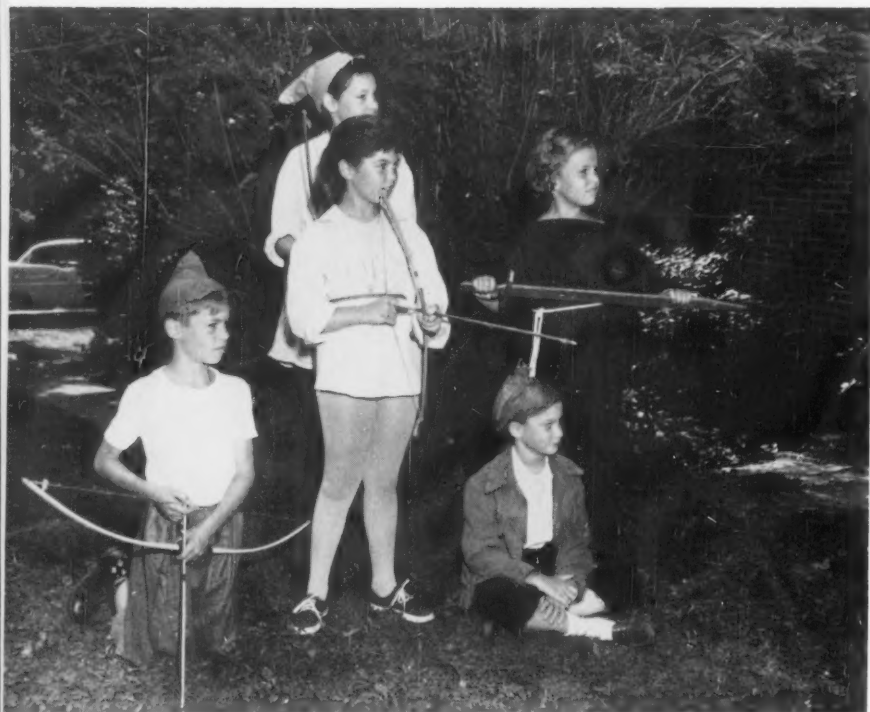
The evaluation is being made partly by parents of the 145 elementary pupils enrolled in the 1956 summer school. All of them will be sent questionnaires asking what they liked and didn't like, and what suggestions they have for improving next year's summer workshop program.

The workshop began two years ago as a dream of Ray J. Naegele. Principal of Ravinia School in Highland Park, he had completed some graduate work at Northwestern University, and he wanted to find something interesting he could do the next summer. "Something interesting" meant something in the field of education.

Ten years ago most Highland Park children went to summer camps. As the community has grown, this has become less true. There are day camps

in the area, some good, some not so good. A summer school, using a public school building and its facilities and taught by qualified teachers, would be of real value to the community, Mr. Naegele thought. The district superintendent, Charles H. Wilson, agreed.

So did the board of education—if the project could be made self-supporting. Questionnaires were mailed to 1185 families with children in the district schools, asking if they were interested in summer school for their



As part of their work in dramatics, fourth and fifth graders presented a scene from "Robin Hood" on the terrace just outside the school's stage. They dramatized "Rip Van Winkle" on the same outdoor stage.

Muriel Meyer, crafts teacher, pins up the hem on the barbecue apron this boy had made. The girls in the class were required to make skirts. The youngsters could also choose from a variety of other things to do, such as etching, making mosaics, painting rocks, and modeling various objects of clay.

children, at a tuition fee of \$60 for six weeks. The response was favorable enough that the board approved the summer workshop.

In 1955 and again in 1956 the workshop was entirely self-supporting. All expenses—teachers' salaries, nominal rent of the building, supplies, compensation for custodians required to do extra work—were paid from the tuition money. In 1955 the nine teachers were each guaranteed a minimum of \$500; Director Naegele, who had spent much time in advance organizing the workshop, received one and a half times this basic amount. After all expenses had been paid the money remaining was divided, giving each of the 10 an additional \$95. In 1956 the guaranteed minimum salary was \$600.

Mr. Naegele says that the cost of supplies is not a large item in the workshop's expenses. In 1956, for instance, sufficient clay for 125 pupils cost only \$10. What is needed, much more than expensive supplies for the children to work with, is a teacher who has ingenuity and can think of things for children to do that they will enjoy doing. Often such a teacher needs only the simplest of supplies—such as the rocks the children painted in their crafts classes.

Emphasis of the summer school has not been on remedial work, although one teacher has spent full time teach-

ing classes in arithmetic and reading both summers. In 1956 only 12 youngsters—fewer than 10 per cent of the 145 enrolled—took these subjects, although some spent two of the four periods on them. These were mostly children who had been ill, were slow learners, or had moved into the district recently. No advanced work in the fundamentals was given. Their summer school studies have no effect on the pupils' grade placement in the fall. This remedial work is the most expensive class offered, but, because most parents are pleased with the results achieved, it seems worth while to continue it.

From kindergarten through third grade—placement is determined by what grade the child will be in in the fall—the children have classroom teachers, with special teachers conducting some lessons so that the youngsters gain experience in all subjects offered during the workshop. Older children take four subjects during the three-hour school day (9 a.m. to noon five days a week). Fourth and fifth graders and sixth, seventh and eighth grades are combined for most classes.

Subjects taught the last two years, in addition to the remedial arithmetic and reading, were art, crafts, French, music, dramatics, science, physical education, and, in 1956, swimming. Enrollment blanks listed these subjects;



parents were requested to list, in order, five choices of subjects for their children to take, because there were some scheduling problems.

Classes are kept small, deliberately; maximum enrollment permitted in the primary grades was 20, which meant many pupils who wanted to enroll have had to be refused. But only with small classes is it possible to achieve a close, friendly relationship between teachers and children, with each teacher knowing well the pupils she teaches.



The atmosphere of the school is quite informal; most of the children, and some of the teachers, wear shorts.

#### CHILDREN LEARN FRENCH

It was with some difficulty that Mr. Naegele found a French teacher experienced in teaching elementary school children. Madame Evelyn Brush, who was born in France but has lived many years in this country, is a teacher at Lake Forest, another Chicago suburb. Before the summer of 1955 she had never taught children younger than fourth graders, but she was delighted to discover how easily younger children learn to pronounce French. The children seemed to be equally delighted with Madame Brush and their French classes. They were especially pleased if they could report having learned a French word or two outside of class. ("My mother has some perfume called *Fleurs d'Amour*.") When pre-kindergartners were admitted to the 1956 workshop, Madame Brush began working with them, too.

Mr. Naegele rather hopes that the success of the French program and of the children's work in creative drama-

tics may lead the district to decide that both French and dramatics should be taught during the regular school year. If parents become enthusiastic enough, he thinks, they'll be willing to pay taxes to support such programs.

The children acquired experience not only in performing short plays but also in being members of an audience, since every class invited other classes to watch its performances. There were no elaborate costumes or props or scenery because each group gave many plays. There was disagreement between girls and boys in the fourth and fifth grade group on just what was suitable for their last play of the 1956 session. They ended up giving three—a scene from "Robin Hood," a scene from "Little Women," and "The Moor's Legacy," based on a story in Washington Irving's "Tales of the Alhambra."

Since the weather in 1956, unlike that in 1955, was fairly cool, the children were able to do many more things outdoors, including presenting such plays as "Robin Hood" and "Rip Van Winkle" on the outdoor stage. The Ravinia School is a cool, high ceilinged building so that even when the weather was hot its rooms were cool in the morning, one reason for

the 9 a.m. to noon hours. Another reason was that the kind of creative teaching the workshop staff tries to do is exhausting. Also, many children took tennis or other lessons in addition to their summer school work, or liked to have the afternoons free to play with their friends.

#### "WE LIVE IN A SCIENTIFIC WORLD"

Science was included in the curriculum because, says Mr. Naegele, "elementary teachers are more likely to be poorly prepared to teach science than any other subject; yet we live in a scientific world, and children are interested in science."

Emphasis in the 1955 session was on astronomy because one of the boys owned a telescope, and the others in the class were interested in how it worked. They became so enthusiastic they arranged to go to the home of the owner of the telescope in the evening to look at the stars. In 1956 the youngsters studied trees, making trips in the school bus to various homes and parks in the area.

Children were charged \$1 a week for riding to and from school on the school bus, which was enough to cover the cost of this transportation. Since there were too many bus riders for one bus but not enough for two, some teachers drove pupils to school in their own cars. (Insurance covered all children, whether they were transported in the bus or in private cars.)

The summer workshop atmosphere is most informal, with many pupils wearing shorts, and teachers often sitting on the floor with their small class groups. Mme. Evelyn Brush is enthusiastic about the ability of third graders and even younger children to learn conversational French. Looking at pictures or drawings, such as the ones the pupils and Madame Brush are holding, helps the children learn and later recall French words and phrases.



When, in the fall of 1955, a questionnaire was sent to parents of pupils who had attended the summer workshop, most of those who replied (about 50 per cent did reply) were enthusiastic about the program. (Two didn't like it.)

As requested, some of the parents made suggestions for the 1956 program. One was that swimming be offered. And so arrangements were made for the youngsters to take two swimming lessons a week at the Highland Park High School. For this \$15 was charged: \$12 was paid to the high school, whose teachers gave the lessons, and \$3 was for transportation and supervision.

#### NO MAINTENANCE PROBLEM

As things have worked out, there has been no problem of interference with the summer maintenance program. The workshop has been well confined to the ground floor of the school, so that some work was done in other parts of the building even while the summer school was in session. Neither teachers nor pupils were bothered by a few chairs stacked in the wide corridors. Also, some custodians took their vacations during the six-week period. The summer school ran from June 18 to July 27, so that much of the maintenance work could be done after it had closed.

In their art classes, fourth through eighth graders drew, in large scale, characters and scenes from well known children's stories, such as "The Three Little Pigs." These drawings were placed around the walls of the school's auditorium. Then, to an audience of younger children, various boys and girls related the stories. Each narrator sat on the floor near the character or scene that figured in the part of the story he was telling.



The first step in organizing a program like this is, of course, getting the support of the board of education. (One reason the Highland Park board favored the summer school is that it is one way of answering critics who object to schools standing idle for three months of the year.) Most of the administrative problems are pretty much those any principal faces. It was necessary for Mr. Naegele to keep parents informed, by mimeographed letters, about plans for the workshop and how to enroll their children. Also, he has been responsible for collecting tuition and other fees.

The biggest problem, says Director Naegele, is to find the right kind of teachers to staff such a workshop. They must understand and appreciate its aims, be able to do creative teaching, enjoy working with children in an informal, relaxed atmosphere, and—the first year such an experiment is tried—be interested enough to risk their professional reputations by taking part in it.

There were teachers from each of the five elementary schools in Highland Park's District 108 on the summer school staff, which means all the teachers in the district have a way of keeping informed about the project. Other teachers were from the other Highland Park district and from several near-by North Shore suburbs.

The 1955 staff members were given the first chance to work again in 1956, but not all were able to return. One was attending summer school, and another was traveling in Africa. Mr. Naegele hopes this pattern will persist—a sufficient number of teachers returning to give continuity to the program but enough new teachers to provide change and new ideas.

#### INFORMAL FACULTY MEETINGS

The teachers rarely see one another during school hours, but in a program such as this it is necessary that they be well acquainted and have a chance to discuss ideas and problems. The solution was weekly faculty meetings at the teachers' homes. Each week two teachers were hosts to the other 10. All lived within easy driving distance of the school, and all had cars, so there was no problem about getting to the various homes. Lunch was served about 12:30 or 1 p.m., and then the teachers spent the afternoon (outdoors if possible) discussing mutual problems, suggestions for improvement, children who needed help, ideas for next year—anything of mutual interest. Perhaps most important they had a chance to enjoy one another as people.

The workshop teachers plan to meet this fall and again in May and June to discuss plans for next year. One problem they keep coming back to. In a report to the board on the 1955 workshop, Mr. Naegele said: "The staff as a whole was disturbed about the formality of having 45 minute periods for all subjects. Often a class in crafts could have used an hour or more to carry on its project. While this was an undesirable limitation to the program, we all recognized that it could not be solved without a much larger staff. This was financially impossible, since the pupil-teacher ratio was only 11 to 1." This is still a problem, and they still haven't found any solution.

Visitors to the school were limited to one day a week—Wednesday. Then parents, brothers and sisters, other relatives, and friends of the children were welcome.

Both parents and children have suggested that the workshop run longer than six weeks. But Mr. Naegele's view is that both teachers and children need some complete vacation from school. "Besides," he said, "we'd rather close the workshop while the children are still enthusiastic than have them look forward to its closing." #

WHEN classroom teachers congregate — at N.E.A. meetings or in the faculty lounge—they sometimes express envy of the "rest breaks" that office and factory workers have come to regard as their divine right.

Running a drill press may be deadly, operating a dictating machine and typewriter may exhaust mind and muscle, but consider the debilitating effects of directing, compressing or expanding the energy of 30 or 40 high-powered human mechanisms, the teachers ask one another rhetorically.

It would surprise these teachers to find that a high percentage of school administrators (84 per cent) think that full-time teachers need a rest break at least once in the morning and once in the afternoon. They are not sure just how to arrange such a break, but the idea doesn't upset many of them. Those who are upset, though, are vehemently upset.

Statistically this month's opinion poll may be slightly suspect, for usually the returns from THE NATION'S SCHOOLS questionnaire represent about 3 per cent of the nation's school administrators. This time only 1.1 per cent of the total number of superintendents is represented. Whether the low rate of returns is a result of vacations or of reluctance to answer—lest the teachers might get hold of the magazine—is the reader's guess.

As to when children reach enough maturity to take charge of their own conduct there was little unanimity of opinion. Some said third grade; some said college. Some think at the age of 8, some at the age of 19. Classes differ, many respondents said.

Those administrators who believe teachers need a rest break didn't say why. Presumably they just put themselves in the teachers' place.

The minority group was noisy.

"Just a crazy idea," a New York State superintendent writes.

"I consider these questions stupid and out of order," commented a Bay Stater. "This type of labor-union mollicoddling is to be deplored." Then he added a valid point that a number of others made:

"As long as we are legally responsible for children while they are in school, we are under a legal obligation to keep an eye on them all the time. We can be legally held for negligence if any accident occurs."

"Soon teachers will have more time off than they spend teaching," another lamented.

## OPINION POLL

**Rest breaks for teachers may be desirable, but may be possible only if responsible person can take over supervision of class**

A nationwide sampling of superintendents' opinions by The Nation's Schools

An Ohio superintendent writes: "The better teacher has good rapport with the pupils so that the teaching-learning situation becomes such a pleasure that few if any 'breaks' are needed during a two-hour period."

The superintendent of a large city in Texas points out that in his broad-fields plan of organization teachers beginning with the fourth grade are able to get a break, but the self-contained classrooms cannot have breaks without leaving the children without supervision. "Of course our primary teachers have a shorter day than do the upper grade teachers and do not require breaks," he writes.

There was no consensus on the length of the rest break among those who favor it.

If teachers get a rest break, who will be in charge of their pupils?

Many administrators would make use of special teachers—music, art,

physical education — or supervisors. Others suggest the use of a roving (or rotating) teacher, a substitute teacher with a staggered schedule, or teacher aides. A few even said that an extra teacher should be hired.

Williamsburg, Iowa, is one of several systems that schedules a combined recess period for two grade rooms, with one teacher in charge of the two groups and the other resting. The teachers alternate.

Several would use the principal for classroom supervision during a teacher rest period. Others would use future teachers, or high school youngsters, or reliable upper grade children, or class leaders. Still other superintendents thought school clerical help could supervise teacherless classrooms. Some suggested that homeroom mothers or P.T.A. members come in on a voluntary basis or that adult helpers or "utility persons" be employed. #

### REST BREAK FOR TEACHERS

When a teacher is assigned to a group of children for a full half day, as is generally true in the grades, should some arrangements be made to give her a rest break at least once in the morning and once in the afternoon? Yes...84% No...16%  
How long? 10 min.....28% 15 min.....53% 20 min.....13%  
Other.....6%

In what grade or at what age have children reached enough maturity to take charge of their own conduct if the teacher is to have a rest break or "pass"?

Grade	Per Cent	Age	Per Cent
3d .....	14	8 .....	10
4th .....	29	9 .....	16
5th .....	15	10 .....	22
6th .....	12	11 .....	16
7th .....	13	12 .....	14
8th .....	3	13 .....	4
9th to college .....	14	14 to 19 .....	18
	100		100

In situations where the class should not be left without a teacher, how can arrangements be made for some responsible individual to be in charge of the class during the teacher's absence for rest?

"It ain't what it used to be"

# THE CHANGING SUPERINTENDENCY

*The new job of the chief school administrator  
is quarterbacking the community team  
for the improvement of education*

**WORTH McCLURE**

*Former Executive Secretary, American Association of School Administrators*

THE postwar decade with its new pressures may be working changes in the superintendency. "Public relations," "human relations," "community relations," whatever it's called, looms larger in the superintendent's reckoning than ever before.

Inspired by the question of an alert woman school board member at the study conference of the National Citizens Commission for Public Schools last January 9, I asked 78 superintendents of schools two questions:

"Compared with the prewar days has the superintendency changed? If so, how?"

The superintendents were also asked to make a distribution of 100 points over a suggested list of responsibilities which they were free to revise or add to in any way. Replies represented school systems of all sizes and all sections of the country.

Sixty-three superintendents replied: "The superintendency has changed strikingly since prewar days."

One said: "The superintendent's job hasn't changed, but the public has."

As a check on their general statements they were asked to indicate relative importance by distributing 100 points over a suggested list of responsibilities. They were cautioned that this was *not* to be an estimate of time devoted to each.

Here is how their replies added up:

*Improvement of instruction* was awarded first place. This nod to tradition was not too emphatic, however, for they gave it a median rating of

25 points while *managing the program* (personnel, business and routine) and *working with the community* were each awarded medians of 20 points. An interesting sidelight is that, as expressed by point weightings awarded these three responsibilities, all three sets of responsibilities received median ranking of "2." Instruction failed to get a clear-cut median ranking of "1."

**Comments suggest reasons.** One large city superintendent circled the instruction, community and board items and noted: "These three are tied closely together, much integration and much overlapping." A suburban superintendent said: "The difference as I see it is that it [the job] used to be intra-school; today it is outside the schools."

*Working with the board of education* received a weighting of 20 points and ranked after management, instruction and community responsibilities.

**Last place to personal and professional growth.** One superintendent said plaintively: "All of this is my professional growth." Another: "It comes with foregoing activities." "Little time for imaginative invention," said a superintendent in a large eastern city. "Expectations of school boards and public have increased so much that time for vacations, normal rest, and even for quiet thinking and planning are virtually things of the past."

Suburban superintendents and those of middle sized city systems appear to rate *school board relationships* a bit higher than do their colleagues in larger

cities. They gave the item a median weighting of "20" as compared to "15" by the large city group but agreed with their large city opposite numbers in ranking it fourth in importance. This could reflect greater activity in studying school problems by board members in those communities.

**Superintendents are thoughtful about their jobs.** Although a "quick reaction" was asked for, many superintendents wrote exceedingly thoughtful letters, thus reflecting considerable previous thinking.

Said the chief administrator of a middle sized city on the Mississippi River: "I think, too, that the increased interest of the people generally in their schools has developed a whole host of questions and problems and frictions which are a tremendous drain upon the superintendent's time and nervous energy. He's not only an educational leader for the staff but he is a public relations expert for the schools to the supporting community." The superintendent of a midwestern capital city says: "Time consuming know-how is involved in the development of democratic procedures."

From a middle sized community in the Southwest a superintendent writes: "Through the intervening years there has emerged a new concept of the superintendent's job which can be described as one that requires new depths of understanding, human relations, critical analysis, social trends, and patterns of community action. Staff rela-



relationships are based on cooperation and mutual undertakings."

Buildings and curriculum study by citizens take time, says the superintendent of a corn belt city. "The planning of new buildings and the study of the curriculum again involves many people of the community working through their various citizens committee groups. In my own situation I have found that almost 50 per cent of my time is involved in this type of work."

Says the superintendent of an eastern suburban system: "It is the fact that the emotional strain on the superintendent today is much greater than it was in the past. I don't quite know how to spell this out, but I do feel that superintendents everywhere are living under emotional stresses much more than they were in the past."

A superintendent in a metropolitan city of the North Central area cites as his chief concern: "*Relationships with other governmental agencies* at local, state and national levels require conferences, correspondence, reports and financing arrangements or accounting."

Succinctly a West Coast city superintendent describes himself: "The effective superintendent in 1956, it seems to me, must also be a salesman, businessman, public relations expert, and forecaster." He adds: "But I still like it because it is interesting, challenging and very satisfying."

Teamwork does it, according to the superintendent of a growing city in the South. He writes that he "is working more closely on a more intimate professional basis with his board of education." He also works "in a more cooperative way with the entire professional staff of the schools, using the staff to a great extent in immediate and future planning. The public school of today is more of a well coordinated organization than a one-man show."

A northern city superintendent lacks a word for it. He lists: "(1) vastly increased responsibilities and time in connection with—and I loathe the term but don't know a better one—the 'democratization' of the school system—working with teacher and lay committees in the development of school policies, curriculum, community relations, and understanding of the schools and school problems; (2) a considerably increased amount of time devoted to relationships with the board of education."

Danger ahead, says the superintendent of a midwestern suburban sys-

tem. "Since 1941 the superintendent of schools has been forced to give increasing amounts of his time to school budgets and school building planning and development. He has also found it necessary to devote much more time and attention to school public relations. In my judgment he has spent a dangerously small part of his time in exercising educational leadership which should be his major responsibility and concern."

#### PROMOTED!

That the superintendent has been promoted is the feeling of a midwestern large city administrator who looks ahead with enthusiasm: "It seems to me that since 1941 the superintendent has moved out of a cloistered atmosphere to a front line position, and, therefore, in the area of working with the community he has become the front line man for education. I personally believe that we are doing more now in improving instruction with the use of new media and, therefore, perhaps performing more basic research than we did in 1941."

How improving instruction and community relations go together is revealed by this from the head of an industrial city system in the Middle West: "We use the community a great

deal in developing curriculum and in improving instruction. I suspect we have at least 25 or 30 adult committees working all the time on various phases of the school program—the gifted child, economic education, the retarded child, practical nursing education, and so forth."

Good advice for administrators from a colleague who heads an eastern city system: "More tact and patience required. Greater participation in community activities expected. Less time and energy available for supervisory administrative duties within school district organization. Greater dependence upon specially trained personnel within the organization. Greater difficulty to find the right person for specifically defined duties or to fill certain types of professional vacancies. Greater need for greater concern on the part of the electorate to select a higher type of citizen to represent them as school board members."

Conflicting pressures catch the superintendent in the middle, according to the superintendent in a midwestern city: "The superintendent is caught between a hue and cry for an educational policy that harks back to 'the good ole days' and a persistent clamor for changes to fit a new world. For several years there has been no such thing



Perhaps a nine-handed superintendent could juggle all his duties.

as normalcy for the school administrator, and in recent years his job has frequently been described as one of the most exacting in the world."

Working with citizens groups is stressed by a southern superintendent: "There is a terrific difference by way of the increased amount of time spent with citizen groups as they participate

in the study of school problems or as we work with them in resolving their concerns and criticisms. In this category I include also the increase in time for press, radio and TV. This, of course, is a good change."

A good offensive is the best defense, believes this superintendent of a middle sized northern city. "In order

to maintain educational standards, the superintendent has shifted from a defensive position against the pressures of depression and war to an offensive position in which he is now undertaking to give leadership to his staff in their efforts to improve the curriculum and instruction."

The superintendent in a northern suburb adds it up encouragingly: "With increased expectancy the lay public exerts influence better to use the available human and material resources for improvement of education. Therefore, the job has changed from the doing of routine to one of community leadership in developing an educational climate for decision making for improved program."

Of course this informal inquiry settles no statistical hash, but it does raise a pertinent question or two and point directions for further study.

## Look for the source of *Misunderstandings*

**GUY CHAPMAN**

*Director, Pupil Personnel Services, Tulare County Schools, Visalia, Calif.*

**W**HAT factors help the modern-day parent to decide if the schools are doing a satisfactory or unsatisfactory job?

Not long ago I was seated in the outer office of one of our elementary schools waiting to see the administrator. An irate parent passed through this office directly into the administrator's office without waiting to be announced. In his hand was a copy of one of the state series textbooks. He failed to close the door in his hurry so parts of the ensuing conversation were audible.

During the discussion it was obvious that this parent was concerned about his son's academic achievement. He felt it to be inadequate, below average, and as he put it, "When I was in school we would have been almost through this book at this time instead of just beginning." The parent was not only disturbed but was not making a rational or intellectually sound complaint. The administrator realized this, and waited until his visitor had talked out some of his complaints before attempting to discern what lay behind the accusations.

Frequently teachers and administrators are faced with similar problems in promoting understanding between parents and schools. The issue that the parent presents as a reason for dissatisfaction is rarely the real issue. Behind these multiple complaints are usually hidden the real source of friction. Sometimes these real sources of irritation go back to the parent's own unsatisfactory experiences in school. Occasionally the parent is upset because of personal problems that are

entirely unrelated to the school but that cause him to be generally critical of the world.

The handling and working through of these situations by public educators are largely determined by the understanding of human nature they possess. A good public educator does not react defensively to these experiences, nor does he take them as personal attacks upon himself. If he does, the educator unwittingly antagonizes the parent to a greater degree.

When we as educators are confronted with such situations, we should ask ourselves:

1. Is the parent trying to tell us something about his early school experiences?
2. Are we dealing with an attitude about schools that developed from some unsatisfactory school experiences the parent had?
3. Is this a scapegoat experience resulting from other personal pressures and feelings that the parent is bringing to us from unrelated areas such as his job dissatisfaction or family difficulties?
4. If the expressed problem is not the real source of irritation (which it rarely is), how can we go about helping the parent clarify his feelings and gain insight as to what the real source is?

Neither teacher nor administrator need be an experienced counselor, but this type of approach will lead to better understanding on the part of both the educator and parent that ultimately will benefit the child, who usually suffers when school and home are not engaged in a cooperative effort. #

### SO WHAT'S HAPPENING?

With the public in on everything, are we in danger of losing the improvement of instruction as our main goal? In other words, is this "activity program for lay citizens" likely to become an end in itself? Or, instead of losing sight of instructional improvement as the goal, are we just developing a new method of attack—a sort of reconnaissance in force with the citizens, the staff and the board—and perhaps the pupils—working together and the superintendent, as one put it, becoming "a general in the army"?

At any rate, highly significant is the way these 64 superintendents tend to think of administration, improving instruction, and community relations as parts of an interwoven complex of activities. This testimony from the field confirms the statement of the 1952 A.A.S.A. yearbook commission<sup>1</sup> that the superintendency is a constellation of closely interrelated tasks and should be studied as such. It endorses what the 1950 yearbook commission<sup>2</sup> said—that cooperative improvement of the school program is both the process and the objective of school public relations.

And let's not forget our West Coast superintendents, "but I still like it, because it is interesting, challenging and very satisfying!" #

<sup>1</sup>The American School Superintendency, 30th yearbook, American Association of School Administrators, Washington, D.C., 1952, p. 67.

<sup>2</sup>Public Relations for American Schools, 28th yearbook, American Association of School Administrators, Washington, D.C., 1950, p. 495.



*In theory, Congress has  
vast powers of control, and*

## ***Authority Over Education Is Shifting Toward the Central Government***

**I. NEWTON EDWARDS**

*Professor of Education, University of South Carolina*

THE concept that the state is a carrier of democratic values has profoundly affected the development of American education from its very beginning. With us, education has always been vested with a public interest; its fruits have never been regarded as wholly private and personal.

It is to the credit of the founders of New England that they asserted, and to a degree implemented, the conviction that "the good education of children is of singular behoof and benefit to any commonwealth." Later on in the early days of the republic the men who were laying the foundation of the American political structure were genuinely afraid that their experiment in free political institutions would fail. They had no doubt that it would fail if the state neglected to cultivate in youth that degree of social understanding necessary to pass intelligent judgment on public issues.

No one familiar with the record can doubt that the dynamics of public education in this country is to be found in the emergence of the democratic state as a form of political organization. The essentially civic character of American education is documented in

the writings of statesmen and publicists, in the debates of state constitutional conventions, in statutory enactments, and in judicial decisions. As Lee Garber has clearly shown in his analysis of the debates of state constitutional conventions, the most telling argument, and the one most frequently made, of the supporters of public education was that the "very safety and perpetuity of the state depends upon an enlightened citizenship."<sup>1</sup> His analysis of these debates reveals very clearly that those who laid the foundation of our system of education were not unconcerned with the benefits that would accrue to individuals from a system of public schools, but their chief concern was for the political, economic and general well-being of society.

Repeatedly our courts have been called upon to define the functions of the school in American society. Of necessity, they have formulated a theory of education based upon what they deemed to be fundamental principles of public policy. In legal theory, public education is essentially and intrinsically a function of government; it is even more, it is an attribute of government. In the democratic state

an enlightened citizenry is so essential to the promotion of the public welfare that the maintenance of a system of public education has been regarded as as much an attribute of government as the police power or the power to tax, to administer justice, or to maintain military forces. Public education, of course, is intended to confer benefit upon the individual child, but its purpose is far broader and more significant than that. As the supreme court of New Hampshire has put it:

"The primary purpose of the maintenance of the common school system is the promotion of the general intelligence of the people constituting the body politic and thereby to increase the usefulness and efficiency of the citizens, upon which the government of society depends. Free schooling furnished by the state is not so much a right granted to pupils as a duty imposed upon them for the public good. . . . While most people regard the public schools as the means of great personal advantage to the pupils, the fact is too often overlooked that they are governmental means of protecting the state from the consequences of an ignorant and incompetent citizenship."<sup>2</sup> (Continued on Page 62)

<sup>1</sup>Adapted from a speech delivered at the School Law Conference, Duke University, Durham, N.C., June 27, 1956.

<sup>2</sup>Garber, Lee O.: *Education as a Function of the State*, Minneapolis, Educational Test Bureau, Inc., 1934, p. 4.

<sup>3</sup>*Fogg v. Board of Education*, 76 N.H. 296, 82 Atl. 173.

Public education inescapably confers benefits upon individuals and through them upon society. It is not, however, an individual right; it is, rather, a privilege conferred upon the individual by the state. The only right the individual child has is to enjoy equally with others such educational privileges as the state may bestow. And from its origin to the present day, the state's controlling interest in education has been the development of citizens sufficiently intelligent to preserve the democratic state and through it to realize more nearly the values upon which the whole structure of our civilization has been erected.

\* \* \*

THE locus of authority with respect to education is a matter of importance in any society; it is especially important in a federal state. The conviction that education is essentially a function of each of the respective states of the United States lies deep in our tradition, both of law and of practice. The general structure of the American federal state is such that the central government is one of delegated and enumerated powers, and all other powers not expressly or impliedly delegated to it are reserved to the states. As the Supreme Court has clearly put it: "Each state has all governmental powers save such as the people, by the Constitution, have conferred upon the United States, denied to the states, or reserved to themselves. The federal union is a government of delegated powers. It has only such as has been expressly conferred upon it and such as are reasonably to be implied from these granted."<sup>3</sup>

Although the doctrine of delegated powers does not hold in many areas of foreign relations and is subject to exceptions even in other areas, it is still fundamental in determining the locus of authority over education.

Since the Constitution of the United States makes no mention of education,

it follows that whatever positive powers the federal government may exercise with respect to the support and control of education in the states must grow out of some implied grant of power. The taxing clause confers upon Congress power to levy taxes "to pay the debts and provide for the common defense and general welfare of the United States."

As this clause has come to be interpreted, it apparently confers almost unlimited power on the federal government to tax and spend in the support of education. During most of our national life the precise meaning of this clause has been the source of sharply conflicting views and prolonged debate. Without going into the subtleties of this debate, it may be pointed out that James Madison insisted that the clause conferred no substantive powers upon Congress, that it had been adopted by the convention without debate, that it was not intended to extend the area of federal authority, that it was nothing more than a reference to the other powers later enumerated. In sharp contrast, Alexander Hamilton contended that the welfare clause conferred upon Congress power to tax for purposes separate and distinct from those later enumerated, that it conferred substantive power to tax and spend for any purpose that would provide for the general welfare of the United States.

Despite the fact that Congress had long been spending millions which could not be justified without reference to the welfare clause, the Supreme Court was not called upon to choose between the Madisonian and the Hamiltonian interpretation until 1936 when it decided the case of *United States v. Butler*.<sup>4</sup> In that case the court accepted the Hamiltonian interpretation, holding "that the power of Congress to authorize expenditures of public moneys for public purposes is not limited by the direct grants of legislative power found in the Constitution."

Somewhat later, in *Helvering v. Davis*,<sup>5</sup> the court for the first time sustained a particular use of the proceeds of taxation as an exercise of authority under the general welfare clause. The principle is now well established that Congress may tax and spend to provide for the general welfare, the only limit upon its authority being that the welfare it provides for shall be general and not particular, and that it not act arbitrarily. It would seem, then, that, under its authority to provide for the general welfare, Congress may make any reasonable appropriation for the support of education.

It may be and has been contended that Congress may not only tax and spend to provide for the general welfare but that it may legislate generally for that purpose. This doctrine would render more or less meaningless the subsequently enumerated legislative powers and does not appear to have judicial sanction.

The limits of the authority of the federal government to control education growing out of the welfare clause have not as yet been clearly defined. It is a well established principle that the federal government has the power to employ whatever means may be necessary to carry into effect the powers expressly conferred upon it. And since the welfare clause has been held to confer substantive powers, it may well be that the Congress is clothed with vast powers not only with respect to the support of education but with respect to its control as well. The Supreme Court, it is true, on at least two occasions has held that Congress could not use its taxing power for the primary purpose of regulating and controlling matters of state concern with respect to which it has no authority to interfere.<sup>6</sup> Even so, the limits to which Congress may go in employing the taxing and spending power to control education in the states are still to be determined.

The federal Constitution places certain limitations on the powers of the states, and it may well be that these limitations in practical operation confer upon the federal government greater control over education than that which flows from the interpretation of the general welfare clause. The

**Limits to which Congress may go in employing  
the taxing and spending power to control  
education in the states are still to be determined**

<sup>3</sup>*United States v. Butler*, 297 U.S.1, 56 S. Ct., 312.

<sup>4</sup>301 U. S. 619.

<sup>5</sup>*Bailey v. Drexel Furniture Company*, 259 U.S. 20; *United States v. Butler*, 297 U.S. 1.



clause in the Fourteenth Amendment which declares that no state may deprive any person of life, liberty or property without due process of law, as now interpreted, confers upon the Supreme Court power to strike down virtually any legislation passed by the states, in the exercise of the police power, which it regards, in the light of social and economic conditions, as arbitrary, unreasonable and unnecessary. It is perhaps not too much to say that the police power of the states is now committed to the keeping of the judicial conscience, and education legislation involving the police power is no exception to the general rule.

Another clause in the Fourteenth Amendment, that which provides that no state may deny any person the equal protection of the law, also confers upon the court very extensive powers with respect to the control of education, as the recent decisions with respect to racial segregation in the schools make clear. Moreover, it must not be overlooked that the Fourteenth Amendment expressly confers upon Congress power to take such measures as are necessary to implement its provisions. The limits of the power of Congress in this respect have not been established, but that they are very broad cannot be doubted.

When one examines the interpretation which has been given the general welfare clause and the Fourteenth Amendment in recent years, it seems clear that *a theoretical base has been established for a significant shift in the locus of control over education from the states to the central government.* The purpose of this discussion is to analyze and not to evaluate. Even so, I would suggest that it would be the wiser policy for the federal government to refrain from exercising the power to control educational policy.

The doctrine is firmly established that each of the several states, within the sphere of its jurisdiction, is accorded plenary control over educational policy. This concept of the supremacy of the state with respect to all educational matters over which it may exercise any control at all is a concept more than any other which guides our courts in resolving the practical issues involved in the maintenance and administration of our public schools. The concept of education as a state function permeates and dominates legal thinking at almost every point. The state legislature, except where restrained by constitutional

**Powers of the local school corporation are  
never inherent; they are expressly or impliedly  
conferred by the state upon local officers**

limitations, may establish, with or without the consent of the localities, any pattern of district organization it deems wise. It is equally free to change existing patterns and to prescribe formulas for distribution of pre-existing assets and liabilities of districts when boundaries are changed.

Since the local school corporation is an instrument of the state and not a legal person and since the title to school property vests in the state itself, neither the school corporation nor local taxpayers can complain of being deprived of property without due process of law when district boundaries are changed and assets and liabilities are distributed according to some statutory formula. More important still, the powers of the local school corporation, be they great or small, are never inherent; they are powers which the state has expressly or impliedly conferred upon the local school officers.

In interpreting the powers which a state has conferred upon its local school corporations, the courts commonly apply the rule of strict construction; if the existence of a power is in doubt it will usually be denied. A school district must act within the scope of its delegated powers, and, where a statutory mode for the exercise of a particular power is prescribed, the mode becomes the measure of power.

\* \* \*

THE concept of education as a state function is of extreme importance in governing the relation of the local school corporation to the local municipal corporation. A school district and a city may comprise exactly the same territory, but they are distinct legal entities, each with its own particular functions to perform. The school district is a quasi-municipal corporation created for the exclusive purpose of carrying into effect locally a state purpose; the city is a municipal corporation created to direct and control local

concerns. Since in legal theory education is essentially and intrinsically a state and not a local concern, it is not to be regarded as a municipal function.

It follows that a city or municipality has no authority, growing out of its nature as a corporation, to control the policies of the local school board. A city may not even expend its own funds in support of education unless authorized to do so by statute or charter.

It is true, of course, that a state may make use of municipalities as instruments of local school administration and in so doing may confer upon them powers as extensive as policy may seem to dictate. It may go so far as to make education a department of city government, abolishing the local school corporation completely. But it cannot be insisted too strongly that whatever powers a municipality or its officers may possess with respect to education are necessarily conferred by statute or charter. Moreover, when interpreting statutory or charter provisions conferring powers over education on municipalities, the courts apply the rule of strict construction. That is to say, the presumption is that the state intended to confer powers over education upon its duly established educational agencies, and that presumption will be overcome only by a clear legislative intent otherwise.

If there is doubt whether a particular power has been conferred upon a school corporation or the city, the doubt will be resolved against the city. This principle of strict construction applies to home-rule charters of municipalities — charters, that is, which make municipalities self-governing and free from legislative interference with respect to matters of local and internal concern. Since education is not a local or municipal affair but an affair of statewide interest governed by constitutional and statutory provisions, a city will not be permitted to extend its control over education by virtue

of a home-rule charter. A municipality may not even exercise its police power over school buildings and personnel except in those instances in which it is expressly authorized to do so by statute or charter or in which it is clearly necessary to subordinate the police power of the regularly constituted school authorities to that of the municipality in order to ensure the public health and safety.

One could, at great length, illustrate still further the pervasive influence of the theory of education as a state function. The doctrine of nonliability in tort is essentially based upon it. School officers are state officers, and they are not to be held personally liable in the exercise of the discretion vested in them. School property is state property, subject to state control in its mode of acquisition, use and disposition. Teachers' certificates are not contracts but licenses which the state may revoke or alter as it sees fit. And children and youth, because the interest of the state requires it, may be compelled to attend school any reasonable number of years.

\* \* \*

IN ANY analysis of the anatomy of authority with respect to the American educational system it is easy to overstress the actual powers of both the federal government and the state government. As a matter of fact, the American people have long insisted, regardless of the theoretical locus of naked authority, that the local school corporation be regarded as the responsible operating agency and that it be vested with whatever measure of power this responsibility entails.

The result has been that during most of our history the federal government, regardless of the powers it may have exercised, has not in fact exercised any extensive control over local policy decisions. The several state governments, instead of exercising *directly* the vast powers vested in them, have chosen to delegate to their local school corporations such powers as were necessary to make them responsible operating agencies. The American state courts have guarded jealously the powers which state legislatures have conferred upon local school boards. They insist, to be sure, that a local board have authority to act, but once that authority has been bestowed they will not control the school board's discretion in the exercise of it unless that discretion has

been unreasonably and arbitrarily abused.

Our state courts have wisely refused so to exercise their power of judicial review of administrative discretion as to make themselves super school boards. When called upon to review the discretion of a school board, the courts will inquire whether the board acted within the scope of its authority, whether it followed the procedures prescribed by statute, and whether it had some reasonable basis for its action. The court will not reweigh the evidence to determine where the preponderance of evidence lies; it will examine the evidence only to determine whether the board acted arbitrarily and unreasonably. If the evidence is such that reasonable men might disagree with respect to the conclusions to be drawn from it, the action of the board will be sustained. The board's findings will be overruled only when it has acted without authority, disregarded the statutory mode of procedure, or acted arbitrarily, unreasonably under an erroneous theory of the law, or without any substantial basis of fact. In actual practice, then, the state's policy of delegating broad powers to local school boards and the courts' practice of permitting school boards any reasonable exercise of discretion, acting together, make the local school board the vital operating center of American education. This, I may add, is as it should be.

It must not be supposed that the political state is the sole depository of authority over education. We recognize, both in legal theory and in practice, the right and indeed the obligation of *parents* to form the child's mind and system of values by controlling his educational environment. We recognize no place for a monolithic educational structure. However great the obligation of the state may be to provide for the education of children and youth in its public schools, it may not unreasonably interfere with the liberty of parents and guardians to direct the upbringing and education of children under their control. The right of parents to provide an adequate education for their children lies deep in the American tradition and is adequately protected in our system of jurisprudence. As the Supreme Court has put it: "The fundamental theory of liberty upon which all governments of this union repose excludes any general power of the state to standardize its children by forcing them to accept

instruction from public teachers only. The child is not the mere creature of the state; those who nurture him and direct his destiny have the right, coupled with the high duty, to recognize and prepare him for additional obligations."<sup>6</sup>

This right and obligation of parents to direct the destiny of the child is protected in the common law, in the federal Constitution, and in judicial opinion. In the decade ahead it may well form the basis of a re-examination of the whole concept of public education and of the ways and means by which the state may meet its educational obligations.

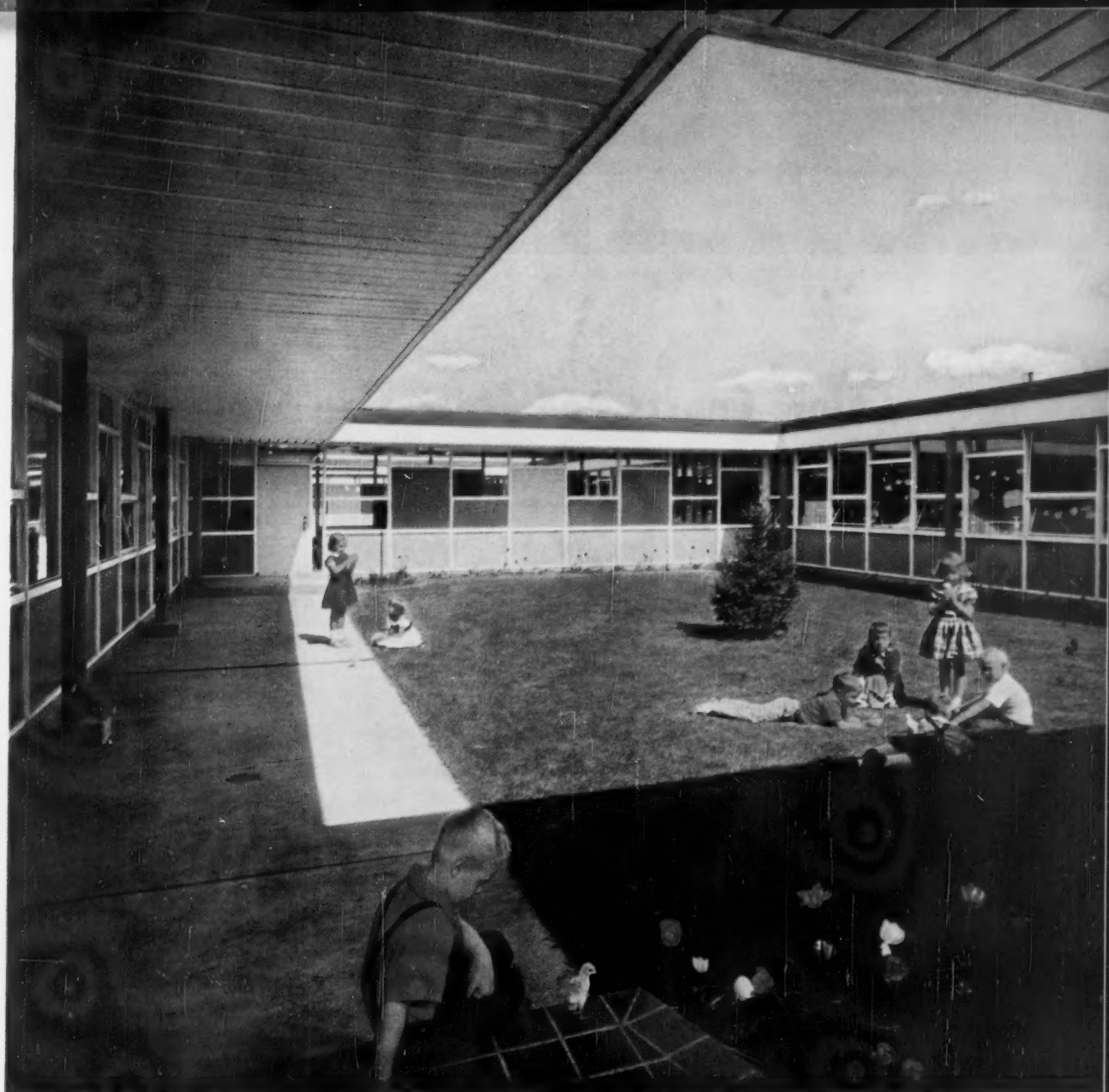
#### FLEXIBILITY PERMITTED

Finally, may I add that the most striking thing about the American legal system, as it has affected education, is the great flexibility it has permitted in institutional forms and in operational procedures. This flexibility has made possible experimentation far beyond that allowed in most other countries. It has made possible, too, adaptation to varied local needs and to changing social conditions. It has permitted, indeed encouraged, diversity of program and practice, but somehow it has not prevented us as a nation from achieving a fundamental unity of purpose.

This flexibility in institutional forms and operational procedures which has so largely determined the character of our educational enterprise has been made possible, quite unmistakably, by the way we have distributed legal authority to the different levels of government and by the spirit of tolerance and restraint in which vested powers have been exercised in practice. The successful operation of our schools in the past is to be attributed quite as much to the spirit of restraint in the exercise of vested powers as to the wise distribution of powers among the various levels of government.

In the years ahead, if there is not to be an unnecessary loss in local efficiency (and in education one is tempted to say that this is the only efficiency) it is imperative that those in whom legal authority is vested exercise that authority with a deep sense of self-restraint. And this is true of state legislatures and state courts and it is no less true of Congress and the Supreme Court. #

<sup>6</sup>Pierce v. Society of the Sisters of the Holy Names of Jesus and Mary, 268 U.S. 510.



Children spend much time in garden courts of Beverly Elementary School at Birmingham, Mich.

## SCHOOLHOUSE PLANNING

### **Color, Courts and Child-Size Scale Make Homelike School**

DWIGHT B. IRELAND

Page 66

### **Beverly School Fulfills "Three E's" of Function**

EBERLE M. SMITH

Page 71

### **Blast Resistant School**

Interview with HARVEY P. SMITH Jr. by LEWIS C. FAY

Page 73





Front entrance to Beverly School, Birmingham, Mich.

## Color, Courts and Child-Size Scale Make This a Homelike School

**DWIGHT B. IRELAND**

*Superintendent of Schools, Birmingham, Mich.*

A BASIC philosophy should precede any building program that a school district undertakes. In Birmingham, Mich., that philosophy states: (1) The building must present a warm, receptive atmosphere for any child who approaches it. (2) Classrooms must be designed in scale with the child

and provide maximum physical and emotional comfort. (3) Classrooms must be sufficiently flexible so they can be modified in any one of many different ways to fit the needs of the teacher.

Such a philosophy cannot be dictated from the central office. If it is to be

acceptable to all persons rightfully concerned it must grow out of experience. Before an architect was selected for the Beverly Elementary School, a complete review of plans for *previous* schools was made by the *teachers* occupying these schools. They were asked to list outstanding features and to sug-

Perspective shows arrangement of building units around a series of landscaped courtyards.





gest any changes that would improve the facilities provided.

Another careful review was made by elementary school principals, and everything was listed that might be helpful to an architect in designing

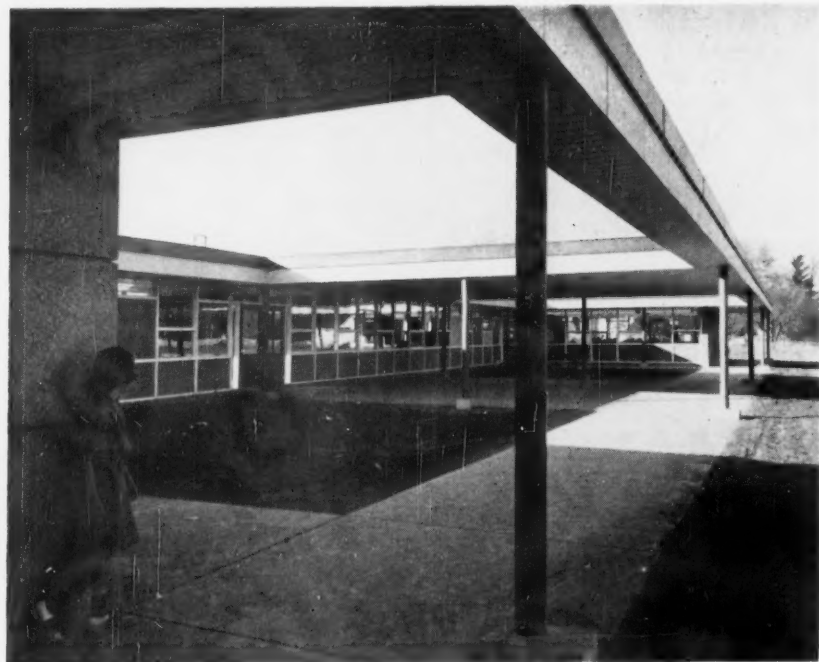
the proposed school. All of these suggestions were then presented to the board of education for discussion and approval.

The architect was also chosen with extreme care. All architects who were

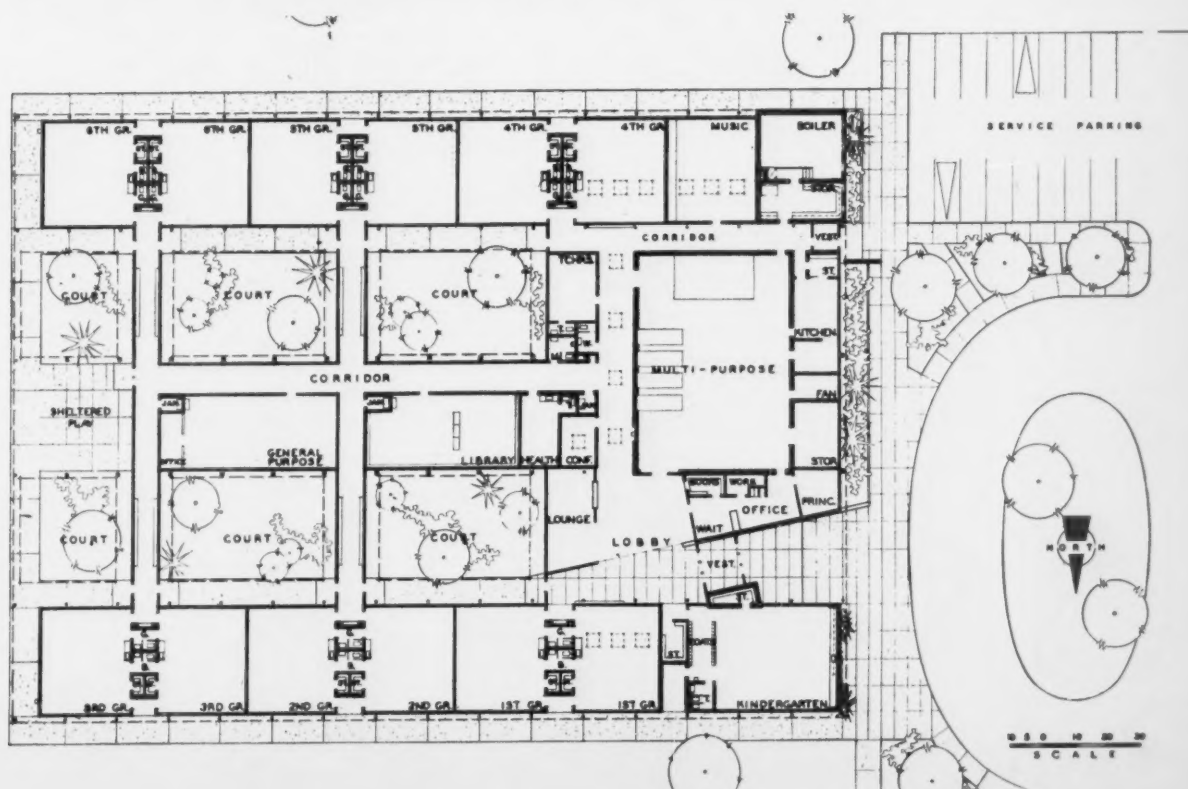
interested were studied in terms of their qualifications, their staff and facilities, and previous work done. Visits were made to completed schools, and the care with which these buildings were planned and designed was carefully scrutinized.

The third step was a meeting of the chosen architect with the board of education and administrative staff to clarify our basic philosophy, stipulate the building facilities that were to be incorporated, and start preliminary sketches.

Preliminary sketches are always presented by the architect to the board of education and the administrative staff. They are carefully reviewed in terms of adequacy of the facilities provided, orientation on the site with special emphasis on natural lighting, access to the building, and location of play areas. Seldom is the first presentation acceptable. More frequently three or four meetings to discuss proposed modifications are required. If the problem of orientation on the site is not satisfactorily solved at this point, the facility will never afford the satisfaction one desires regardless of how well the building may be constructed or how adequate the space for each function. Particularly is this true of lighting. In Birmingham we believe that north and south lighting with a corridor or a deep overhang on the south exposure is the best answer. In Beverly



Above: The clear-cut modular structure system is shown in this view of the rear portion of the original building. Beams and columns were all in place for the new addition now being built. Below: Floor plan of Beverly School. Six classrooms are being added on the east, a kindergarten on the south.



Elementary School experience has proved over a period of two years that classrooms can be so designed that one does not need to resort to the use of draperies or venetian blinds for light control. Best of all, teachers are convinced of this.

The building is on a 12 acre site, set in the center of a large residential block in an area 174 feet wide by 260 feet long. Parking space is provided, and a driveway leads to the site from Beverly Road (the main road).

Our philosophy emphasizes that the school must provide a warm, receptive atmosphere for the child. Too many of us recall earlier schools and the formidable atmosphere one sensed when he entered the building. Cold, bleak corridors extended in several directions, and it was frequently difficult to find the office. In Birmingham all recent buildings include a reception area which immediately solves this problem. One enters this nicely fur-

nished, attractive area and is immediately at ease. It is so complimentary to have a parent with a child say, "Can't we just sit down here and review our problem?" The office area is adjacent to this reception area, so the administrative staff of the school is not only accessible but readily available to help the parent or the child in whatever way possible. This embodies "service" at its best and is the first step in fine public relations.

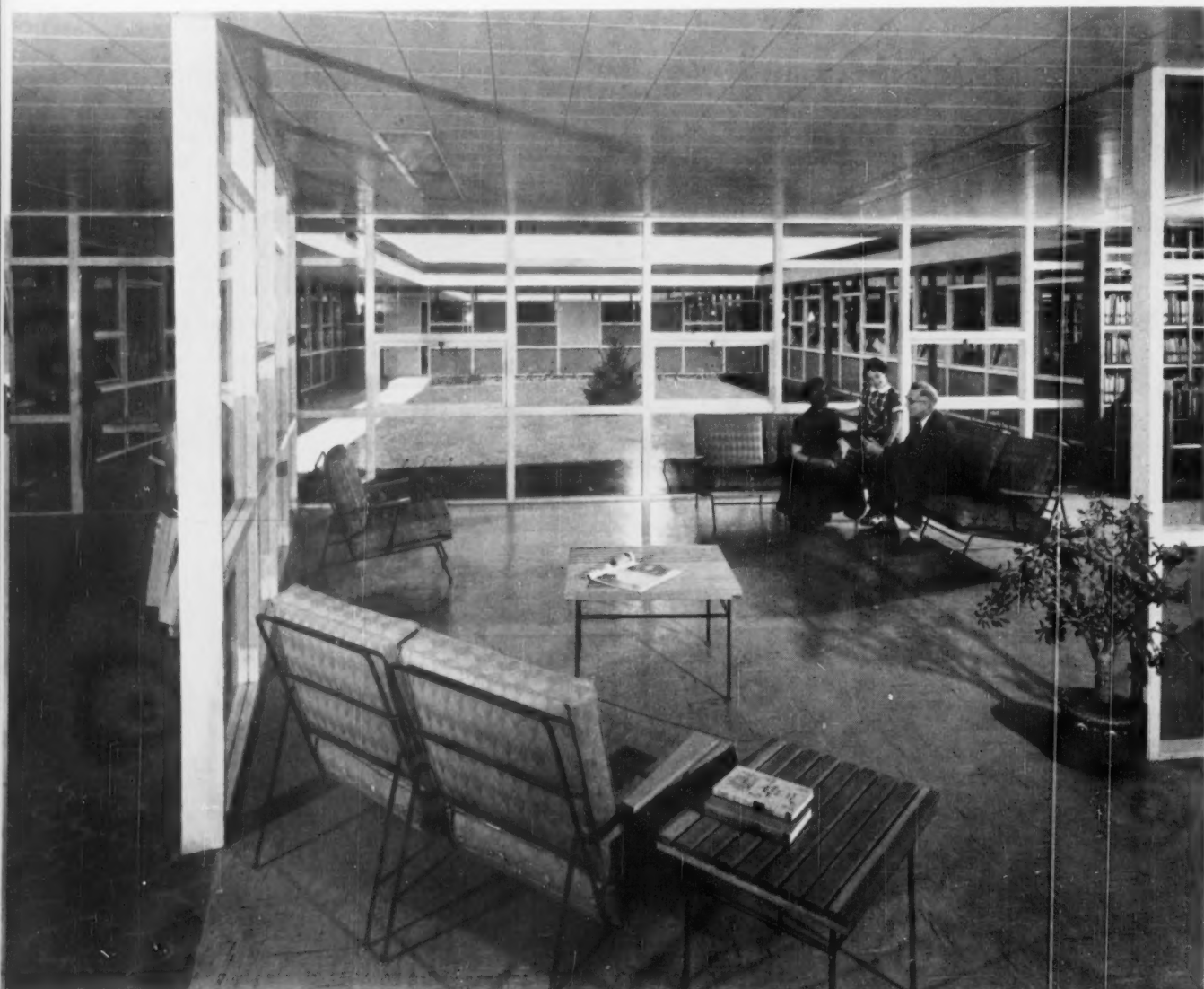
Each classroom is also planned as a self-contained classroom. The atmosphere must be as homelike as possible. The rooms must be light and cheerful. Ceilings have been dropped to 8 feet in this elementary school, which is more in scale with the child's size. A toilet facility is provided for each room, which further preserves a home atmosphere in terms of the child's experience. The sink has a bubble fountain for drinking water, a place to wash one's hands, a facility for cleanup,

and a source of water for such activities as art. Children require plenty of drinking water and frequently suffer from a lack of it when the drinking fountains are in corridors.

The size of the classroom must be approximately 900 square feet for elementary classrooms and nearly 1200 square feet for kindergartens. This provides a sufficient area for centers of interest as they may be developed by the teacher on the basis of need. A long, narrow classroom hampers maximum use so classrooms in this school are approximately square.

Approximately 16 feet of chalkboard is sufficient in the front of the room. It is installed vertically so it extends down within 12 inches of the floor and up to a height which permits the teacher to use the green chalkboard without stooping. On either side of the chalkboard, space is provided for tackboard and pegboard. Additional tackboard is provided in the rear of the room. The use of redwood or soft wood above and below the tackboard affords additional areas

In the lounge guests may wait and teachers and parents may confer. This area serves as overflow library space while the new addition is being built.





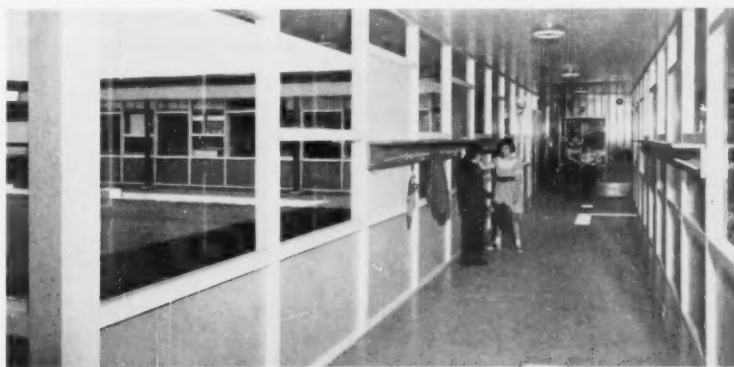
for thumbtacking displays. The windows are also extensively used for exhibiting class work. Some art work is enhanced by the light coming through.

A storeroom readily accessible to the classroom is of great value to the teacher. Many supplies must be made conveniently available if they are to be used. Space also is provided for the teacher's personal belongings.

Other than the sink, fewer cabinets are being built in the classroom than previously. Teachers find movable equipment much more flexible and convenient for setting up centers of learning. Change in itself makes a classroom pleasanter. This naturally requires that all furniture be movable. Blond finishes and color on the book boxes of desks add to the attractiveness of the room. One must decide if the room is to be finished in neutral shades and color added with furniture and furnishings or if color is to be used in the decoration of the room and neutral furniture used. Both plans are used in Birmingham, but the former seems to be better received.

Of course, there must be an exit door directly from the classroom to the play areas. These doors must be somewhat sheltered, according to local experience. If they open directly to the exterior and are unprotected they are

Above: In the kindergarten, flexible furniture arrangements permit a number of groups to work simultaneously on individual projects. In the left foreground are the cubicles in which the kindergarteners place their wraps. Below: These glass walled passageways between the courtyards serve to connect the two-classroom units to the central areas and provide coat hanging facilities. At the far end of the corridor is a lighted display case.



frequently torn off their hinges by a strong wind; they also are difficult to maintain, and children carry mud and water directly into the classroom. A sheltered entrance enables children to clean their feet, brush off excessive snow, and enter the room without the cold blast of air, the strong current of wind, or other evidences of the weather which detract from the comfort and appearance of the classroom. The direct entrance to the classroom

makes it possible for wraps to be hung on corridor walls. Wraps are hung on wooden pegs in the corridor; in inclement weather they dry easily. This removes odors from classrooms and also eliminates much of the congestion in classrooms at dismissal time. Our staff prefers this arrangement.

The controversy about corridors *versus* corridorless schools is well known to us, but preference is still given to corridors in Birmingham.



Conference rooms are provided for speech correctionists, visiting teachers, nurses and others who contribute to our program in this way. Children should find these conference rooms easily accessible and should not be required to pass through other classrooms or go outside the building to arrive at their destination (even though we are told it doesn't bother them). The console for the public address system is located in the general office; there are also many other reasons for the office to be accessible to the child. The multipurpose room is used for many activities that require constant traffic. Each child must report for the regular annual program of audio-visual testing. Projectors, screens and book kits must go from classroom to classroom. Our conclusion is simply that we want corridors.

Inner courts that are completely enclosed have become a source of great satisfaction in this building. The first use involved the planting of bulbs. These courts had been carefully seeded. A power mower to be used exclusively by the custodian in keeping these courts attractive worked magic. When the children suggested planting bulbs, the custodian immediately offered his assistance. Pennies began to roll in for bulbs. This immediately aroused community interest. The local garden club wanted to help, and suppliers offered

bulbs at attractive prices. The result was the planting of about 4000 bulbs. The beauty of these courts in bloom was so contagious that interest was universal. Fall plantings were insisted upon (and, incidentally, this idea has spread to every school in the system). This was also followed by snow sculpture and many other types of activity that required the protection afforded by completely enclosed courts.

Color is emphasized throughout the school. There was division of opinion as to the extensive use of color. It was finally decided that color was to be used, and panels were painted red, yellow, green and gray. In the inner courts these colors accentuate the beauty of the plantings. The yellow roof band seems to unify the total effect. It must be remembered that elementary children are housed in this building, and they respond to color rapidly. It is not proposed that such a color scheme shall be carried out in secondary school construction. Incidentally, the use of a special window glass in the upper part of the multipurpose room gives the effect of black color against the outside yellow band of painted surface. This gives a striking exterior finish.

The multipurpose room is 48 by 64 feet with a 16 foot ceiling. Baskets are installed at either end for basketball. Tables installed in the wall are

quickly dropped into place for noon lunches, and the kitchen is adjacent. Corridor lines can lead through the kitchen for trays and lunch and then into the multipurpose room. After lunch the room can be quickly restored for play. The kitchen can be shut off so that work there is unhampered when play is resumed in the multipurpose room.

A hydraulic stage has been used in this multipurpose room. This permits the use of the entire room as play area. When a program is planned the stage rises to the desired height and children can be seen readily by the audience. This is especially necessary as the audience is seated on the level floor area. Experience has shown that it is not advisable to arrange assembly programs with children on a floor level. Everyone stands in order to see, and confusion follows. A track has been installed for stage curtains. This plan has been effective enough to make us decide to install hydraulic stages in our school system.

The natural lighting in the multipurpose room comes through shaded glass which eliminates sun glare. The use of draperies made of monk's cloth and mounted on track has sufficiently darkened the room for the effective use of visual aids. Films are frequently shown during noon hour in this room. In many multipurpose rooms there

Teachers can create many arrangements of furniture to give variety and flexibility to instruction. The door at far

left leads outdoors; the door at far right opens to a glass enclosed passageway connecting to central areas.





are unsightly cracks which develop in the cinder block walls as the building settles or expands and contracts with temperature change. In this multi-purpose room these cracks were designed as breaks in the wall during construction, and irregular, unsightly cracks have been eliminated. This has become an important detail in all construction.

The teachers' room is also important in a newly constructed building. It should be pleasantly furnished and truly a place for rest and relaxation. It seemed wise to have an interior decorator make suggestions for this room. Luxury must certainly be avoided, but there is a middle ground which is acceptable to most communities. The morale generated by this pleasant room has substantial carry-over value in the classroom.

The use of panel heating in the ceiling of classrooms eliminates all of the clutter that one associates with radiators or other heating equipment. The porous ceiling permits a circulation of air and is easily cleaned. Access to the heating coils is quickly provided. Exhausting the air through the adjacent toilet rooms gives a comfortable temperature and permits fresh air to be maintained in all classrooms. The source of air is the natural leakage one expects through window and door openings.

Asphalt tile floors are used. A light color aids in light distribution in the room. These floors also are quiet and, combined with the acoustical ceilings, create a restful environment. Parents are so conscious of this improved environment that a citizens committee recommended the immediate improvement of all old classrooms in the city by the installation of acoustical tile and adequate lighting fixtures.

In summary, it can be said that Birmingham is by no means satisfied and complacent about its additional school construction, but we believe we are in close agreement as to the kind of facilities needed to house our school program effectively. We are in agreement on required floor area, the orientation of classrooms with proper overhang for light control, classroom equipment needs, panel ceiling heat, light asphalt tile on the floors, and accessibility to conference rooms and the administrative offices. The Beverly School comes very close to meeting the needs of our basic philosophy.

The school is expected to have an enrollment of 694 this year. #

Has feeling of spaciousness

## Beverly School Fulfills

### "Three E's" of Function

Provides healthful, esthetic environment

conducive to learning by small children

**EBERLE M. SMITH**

*Eberle M. Smith Associates, Inc., Architects and Engineers, Detroit*

EVERY well planned school should have as "required subjects" what we might call "the three E's"—Educative function, Environmental function, and Esthetic function. The first determines that adequate space and equipment are provided to serve the learning processes; the second makes sure that the climatic conditions of heat and ventilation and the physical conditions of illumination and acoustics are attended to; the third gives assurance that the building is an attractive and relaxing place in which to work.

Although these functional qualities constitute a check list to guide our planning, it is only when a building has been lived in for some time that one can determine whether it is truly functional. As the Beverly school enters its third year of classes, the planners feel they can begin to evaluate its performances with some judgment. It is believed generally that the building has fulfilled "the three E's" of function and has measured up to everything expected of it. When the time came to build the seven-classroom addition that is currently under construction, no one hesitated to agree that the original concept should be perpetuated.

This agreement of architects and school administrators on the success of

the building was not mere happenstance. It was the result of thorough study and close cooperation among all the planners. Basically, what the school authorities hoped for was an environment conducive to learning for small children and ideally suited to their activities, in a building that would reflect the character of an attractive and public spirited residential community. It was considered of great importance that the atmosphere should be one in which each child would feel he belonged and would enjoy spending his days.

Furthermore it was desired that the school have an internal coherence, a focus, a relatedness that would make each class feel and act as a part of the school community. Every activity envisioned for the educational program was carefully plotted in relationship to the proposed facilities and layout of the new school.

To achieve the desired effect of friendliness and sense of belonging, a scheme was developed in which units of two classrooms were grouped together about a series of garden courts. The classroom units provide a family-like unity and privacy for each age group, while the visual relationship through the courts and through other rooms helps each child to identify and

establish his place in the over-all environment.

The schematic arrangement of two-classroom units resulted in a simply stated plan that falls within a regular pattern of structural steel framing. The 16 foot repetitive bay spacing and 8 foot sash panels carry throughout the building, thus permitting expedient and economical construction. When the time came for the new seven-classroom addition to be erected, steel columns and beams were already in place to start the expansion, and construction proceeded with virtually no disturbance to the existing structure.

Special attention was given to making the classrooms areas in which the teacher could work efficiently and effectively. Storage spaces for reference books and teaching aids are unusually generous. Not only have all classrooms pleasant views in two directions, but each enjoys bilateral lighting and cross ventilation. The two walls of glass in each room give an unusual feeling of spaciousness. A laminated plastic base protects the interior walls to 12 inches above the floor, but above that height all walls are usable for chalkboard, pegboard or tackboard. Each two-classroom unit has its own illuminated display case.

#### LIGHTING CONTROL

The Beverly planners were cognizant of the fact that good lighting control is one of the necessities in the establishment of an ideal school environment, and careful attention was given to this problem. A study of the plan will reveal that all classrooms are double oriented to the north and to the south; none are oriented to the east

and west. The natural light from the north is relatively free from glare. On the south there is an 8 foot roof overhang that shelters the rooms completely from the sun's direct rays. Broad walks beneath these horizontal sky shields are used for sheltered play areas in inclement weather. Experience has been that no light control in addition to the south overhangs is necessary.

It would have been a simple matter to provide draperies for room blackout for audio-visual devices, but Birmingham school officials have not thought that it was necessary to darken their classrooms completely for such use. In fact, they believe that the totally darkened room has many disadvantages educationally, and so they rely on special high powered projection equipment to give clearly visible audio-visual instruction.

#### ROOM OF MANY USES

Centrally located in the plan is the multipurpose room, which is used as a cafeteria and for assemblies, sports, exhibitions and various community functions. This room, with its 16 foot ceiling, rises above the rest of the school and gains illumination through clerestory windows. By the use of pull draperies this room may be darkened for motion pictures.

The original building contains, aside from its 12 classrooms, kindergarten and multipurpose room, a smaller general purpose room that is used for games and special projects, a pleasant and well equipped library, and a music room, as well as the usual offices, conference room, clinic and teachers' room. The new addition

adds six new classrooms and a kindergarten. A feature that gives an especially warm, receptive and informal feeling to the building is the lounge, located near the main entrance and the offices. This attractively furnished space has a full wall of glass opening onto a landscaped court; this is a pleasant waiting or conference area for a school guest or parent and teacher. Like the other common use areas, it is centrally located and easily accessible from all the classrooms.

#### EXTERIOR CONSTRUCTION

The exterior masonry walls are either of face brick or of colored cast stone panels, and the sash "curtain walls" are set in hollow steel frames. The spandrels beneath the glass in these frames are insulated asbestos board panels. Window frames are white, while the columns, fascia and sash panels are painted in gay tones of red, green and yellow. Interior walls are of face brick, redwood paneling, or cinder block.

The ceilings in all the instructional spaces are of perforated metal pans suspended from radiant heat pipes. Above the heat pipes is a glass fiber blanket that acts as both thermal insulation and acoustical absorption. Thus the perforated ceiling permits the passage of warmed air and also serves to reduce noise. Such a panel heating system provides an even, draft free warmth throughout the classrooms and eliminates space consuming radiators. These ceiling panels are easily removable for access to the piping.

In interpreting and translating Birmingham's educational philosophy, every attempt was made to provide the youngsters of the Beverly school with healthful and stimulating surroundings that would give the best possible balance of economy, utility, beauty and strength. The low, sheltering scale provides a sense of protection and a sense of belonging; the bold, yet pleasing, use of color gives a feeling of warmth and animation that creates an environment of emotional comfort. Indeed, it is the fond hope of all its planners that the Beverly school has met its goals: "the three E's" of Educative, Environmental and Esthetic function.

Total cost of the original building was \$607,375, or \$17.59 per square foot. Total cost of the new addition was \$222,130, or \$17.92 per square foot. Both cost figures include site work but not fees and equipment. #

The multipurpose room is in constant use throughout the day. The children eat lunch, play games, and watch movies there. It's a theater too; in the foreground are the stage, which is hydraulically elevated, and curtains.



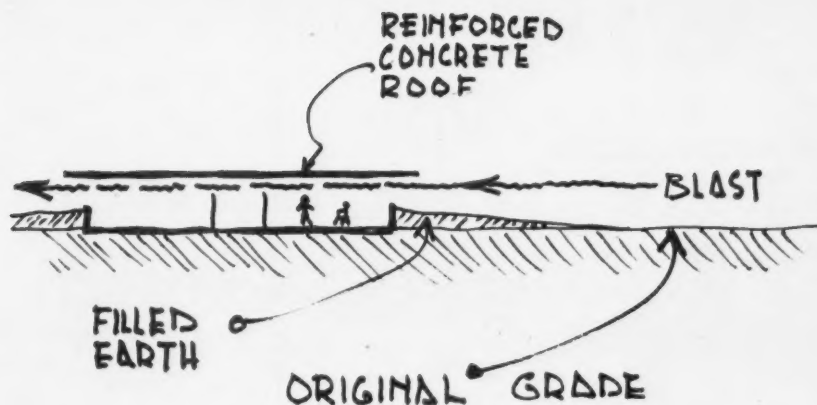


Fig. 1. In a school planned like this, the main force of an atomic blast would roll up the slope of earth and blow through the window panels above the heads of the children.

## BLAST RESISTANT SCHOOL

for the atomic age can be constructed  
economically by use of inverted beam design  
and shield of filled earth

An interview with **HARVEY P. SMITH Jr.**, *Harvey P. Smith & Associates, San Antonio, Tex.*

By **LEWIS C. FAY**, *Sunday Editor, San Antonio Light, San Antonio, Tex.*

**S**CHOOL construction for the atomic age contemplates two basic functions of the school building:

1. Maximum protection of pupils and school personnel, in the event of an atomic blast within effective distance.

2. Maximum utility of the school building as an emergency hospital or disaster center, following the blast.

The first function demands a peculiarity of construction that is basically practical, no more expensive than conventional construction, and, barring a "direct hit," essentially protective of everyone within the building, even if no more than five seconds' warning is given.

The second function presupposes, first, construction strong or resilient enough to remain useful following the initial blast, and, second, a design that will adapt itself well to the grim uses

of disaster, when and if that is necessary.

Both of these functions, in the opinion of Harvey P. Smith Jr. of San Antonio, Tex., young school architect, can be fulfilled adequately with his proposed "inverted beam" design.

### PRIME MILITARY TARGET

Mr. Smith has had occasion to examine the disaster aspects of the atomic age. He lives in an area likely to be a prime military target, in the event of another war. San Antonio is ringed by air force bases, one of which, Kelly Field, is one of the few effective retaliation bases in the United States—one of the few fields large enough to launch the new jet bombers.

Examining the school's defenses against atomic blast, Mr. Smith came to the conclusion that there are only two: first, to resist the blast by actual

strength of construction; second, to avoid the blast.

To provide maximum protection for pupils and personnel, a school building would have to be constructed of reinforced concrete walls of tremendous thickness. This would boil down to a contest between the actual thickness and durability of the walls on the one hand and the force of a nuclear bomb—something unpredictable, to state it mildly—on the other.

Apart from the costliness of reinforced concrete construction—with probable elimination of windows, substitution of elaborate interior lighting for natural light, and air conditioning for natural air—the first approach seemed impracticable to Mr. Smith from still another standpoint.

That was the unpredictability of the bomb blast itself. Such a blast or shock wave, in his estimation, was bound to

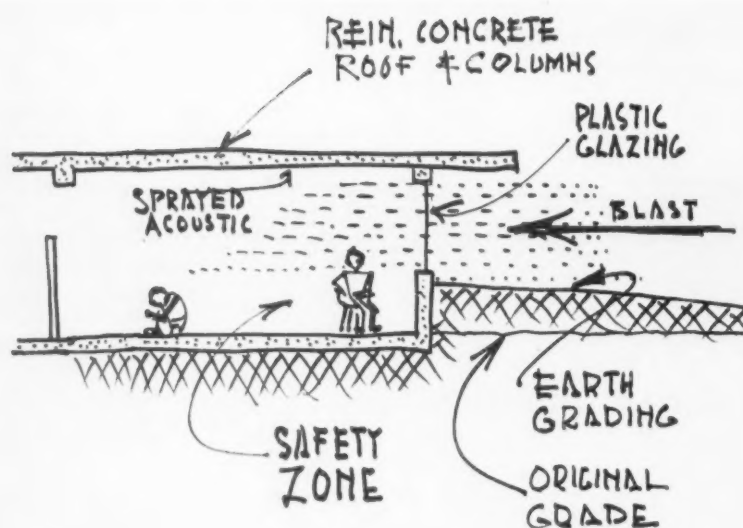


Fig. 2. The upper two-thirds of the school building would present a minimum of resistance to the force of a broadside atomic bomb blast.

vary from lethal, if too intense or too close, to survivable in varying degrees, if less intense and/or farther distant.

"There is no way to say how thick walls must be to survive an atomic blast," Mr. Smith says. "The blast itself poses too many imponderables."

The second defense—to avoid the blast entirely, or to permit it to pass harmlessly overhead—seemed sounder to him. Here no effort is made to resist the blast or shock wave. It is simply permitted to pass over and through the atomic age school in a harmless manner. And on such a thesis is based Mr. Smith's proposed ideal construction.

Mr. Smith's basic idea is simplicity itself. The floor is simply put at the bottom rather than at the top of the floor beam; then the whole is revetted into the earth, to create a "safety zone."

Inherent in the idea is to make the superstructure primarily windows with normal support, and to glaze all windows with a light plastic material to provide protection against flying glass.

Mr. Smith's safety zone would include approximately the lower third of the total cubic volume of the building, a zone created by partially locating the building below the existing ground level, and by tapering the earth outside upward in a gradual slope to a level just under the windows—or to the top of the floor beam.

"This would involve no great excavation job," Mr. Smith maintains. "In so doing, you haven't 'buried' the school. You have simply provided a gradual earth grade from, say, 30 feet out, upward to the window level."

In his calculations, Mr. Smith takes the direst possible view of the expectable blast—*i.e.* that it will come from broadside to the long, exposed side of an ordinary school or wing, perhaps 70 by 200 feet. A broadside blast at any rate, he points out, is the one that normally will do the most damage.

In Mr. Smith's hypothetical atomic age school, then, as reference to the accompanying sketches will show, the main force of the blast or shock wave would roll up the slope of earth, blow out the window panels and pass through the rectangular school unit—*above the safety zone.*

If the safety zone itself extends 4 feet below the level of the revetted embankment and if as much as five seconds' warning can be given, all pupils and personnel can be safely

prone on the floor at the bottom of the safety zone. The full force of an atomic shock wave could pass overhead, with minimum danger to life and limb, barring a proximity of the blast so close as to be lethal—something like a "direct hit."

In Mr. Smith's estimate, the upper two-thirds of the building, which would be subjected to the full fury of the shock wave, must be designed to present a minimum of resistance to passage of the wave.

This would be accomplished by the use of continuous windows, or a "window wall," that would blow out completely—above the grade level. With the plastic panels blown out by the blast, the steel window frames would provide virtually no resistance and could be expected to stay in place.

**The shock wave would pass over and through the school, with children protected in the safety zone below ground level.**

**A continuous window wall with plastic panels would offer a minimum of resistance.**



**The roof slab and concrete columns  
would be strong enough to resist the blast  
unless the school was in the area  
of a direct hit. A sprayed ceiling  
would lessen the fire hazard.**

Thus the only effective resistance to the shock wave would be the narrow edge of a concrete roof slab. That this slab would have terrific resistance to a horizontal blast is apparent in the fact that such a slab is, in effect, a gigantic beam lying on its side.

This slab may be 70 feet wide and 200 feet long, in a typical classroom unit. With its great strength, constructed in the first place of concrete, and its minimum of exposed area—i.e. the edge alone—such a roof slab would offer maximum staying power against a blast from the most disadvantageous, or square on, point of attack.

In Mr. Smith's view, if the bomb detonation occurs high enough vertically and close enough horizontally to subtend vector forces strong enough

to collapse the concrete roof, then all bets are off anyhow. The school, in such a case, would be in the "direct hit" zone or within total destruction range of "ground zero," and no defense of any kind would be effective.

As the angle of attack of a shock wave moves from broadside of a school unit to a direction approaching 90 degrees to broadside, the area of the roof slab exposed becomes correspondingly less. In a blast attack angle square to the narrow end of a rectangular unit, the effective "beam depth" of the roof slab, and its comparative strength, are greatly increased.

In Mr. Smith's ideal atomic age school, the roof would be a reinforced concrete slab, strengthened by reinforced concrete beams that, in turn, would be supported by reinforced con-

crete columns. All of this superstructure would be tied into the foundation and floor slab, to provide one structural skeleton. Solid masonry walls at either narrow end of the building would add lateral stiffness to the whole superstructure. This whole construction is typical of a normal school, and represents no addition to usual construction costs.

Thus while his continuous window wall idea looks toward instant admission and pass through of the shock wave, the concept of bull strength to resist the blast is not ignored completely, but finds its place in his sturdily built roof slab and concrete columns. These must stay put—if the building is to protect its occupants, and if it is to remain in useful condition for later service as a disaster center.

Among vital interior details, sprayed acoustical plaster applied to the ceiling would lessen the danger of inflammable material's dropping on pupils or personnel.

Mr. Smith's atomic age school would keep an opening at the top of each interior corridor partition of nearly the same depth as the outside window walls. This would provide an instant pass-through for the shock wave. Even though the open area at the top of the partitions ended short of the actual safety zone, the effect of the open area would be to provide quick access to the main force of the blast, and conceivably would permit the interior corridor partitions to remain standing.

Thus a broadside blast striking the north side of a rectangular building

Fig. 3. The safety zone would extend 4 feet below the embankment. Five seconds' warning would allow children to shift to a completely protected area.



oriented east and west, designed, built and reverted according to Mr. Smith's plan, would smash inward on the north side, bringing in the plastic panels in its passage. It would sweep from there across the corridor, through the open tops of the partitions, and out the south side of the school building, blowing the panels of this window wall outward.

"It has been demonstrated," Mr. Smith comments, "that a school can operate effectively with only partial-height interior partitions. With proper acoustical treatment, there need be no undue sound transmission between corridor and classroom and no excessive noise levels at any point.

"The use of partial partitions is proved practical. If, in turn, they are made of light, nonflammable material, even their partial collapse during the pass-through of an atomic shock wave needn't cause serious injury."

Mr. Smith estimates that his ideal sill height would be about 4 feet from the floor level. The upslope of earth outside would terminate just below, or at, the sill level. His floor would be of reinforced concrete, and the inverted beam, which would serve as part of the foundation support, would also be the retaining wall for the earth embankment.

In conventional construction, this same beam would be present, but occurring below the floor level. The inverted beam would have the same

strength, in supporting the floor, as would the conventional beam extending beneath floor level.

Mr. Smith believes that this type of school construction is even more pertinent in these latter atomic days, what with the intercontinental ballistics missile soon to become a constant threat. In the present concept of the I.C.B.M., he holds, such missiles may be launched without the pinpoint accuracy to be expected of aerial bombardment. Hence, the arrival of a missile becomes a matter of averages—with schools and hospitals no more sacrosanct than the air base that may lie 25 miles away.

The effectiveness of Mr. Smith's "avoid the blast" theory would exist everywhere in the school building built to his design. Even without warning, he points out, the survivor of the mechanical damage due to the actual physical force of the shock wave would suffer a percentage of damaging nuclear rays far lower than in a conventional building. For his nuclear absorption is proportionate only to the area of the body exposed; *i.e.* in this case, the area above the window sill level and consequently above the earth embankment.

A child seated at his desk in Mr. Smith's reverted classroom unit, therefore, would be from 80 to 90 per cent within the safety zone and would suffer only from 10 to 20 per cent of the nuclear ray effect of a child "exposed" in an ordinary classroom.

Mr. Smith points out that an extended thickness of earth is the best known protection against the lethal rays emitted by an atomic explosion.

In the atomic age school's second function—that of disaster center or emergency hospital following the blast—the reverted building seems to offer the likelihood of less permanent damage than an ordinary building. If the roof slab and the reinforced concrete pillars hold, as seems likely, the building can be swept clear of debris in a few minutes and turned into a disaster center almost at once. Absolutely essential repair work would probably come down to replacing window panels or sealing up the smashed window walls with temporary closures.

Mr. Smith insists that neither the over-all appearance nor the cost of school construction would be materially affected by application of his atomic school principles.

For general preparation of the school for emergency use as a hospital, a number of factors have to be considered, of course. One is an emergency power plant, whose possible uses are obvious.

Again, an off-street drive should be provided, for quick ambulance entry. Thought might be given to providing a double or treble width drive, for faster movement of ambulances and official cars.

All classroom doors should be 42 inches wide, which would be wide enough to admit a stretcher or litter.

And finally, classrooms should employ only movable casework and other equipment, so it could be cleared away instantly, to make room for beds and other hospital equipment.

Some observers have insisted that a two-story building, to be useful as a hospital, must have an elevator. Mr. Smith offers no objection but points out that his reverted-classroom, inverted-beam proposal lends itself only to single-story construction.

"There's no reason the inverted beam design couldn't be used in a two-story building," he adds. "But the safety zone, which is the whole reason for the design, would still be available only to those on the first, or ground, floor."

The atomic age has been glumly heralded as the "last" age of man. Atomic survival can become a major preoccupation for a vast area within a split second. We should, Mr. Smith insists, plan ahead a bit farther than the conventional weapons of World War II forced us to plan. #

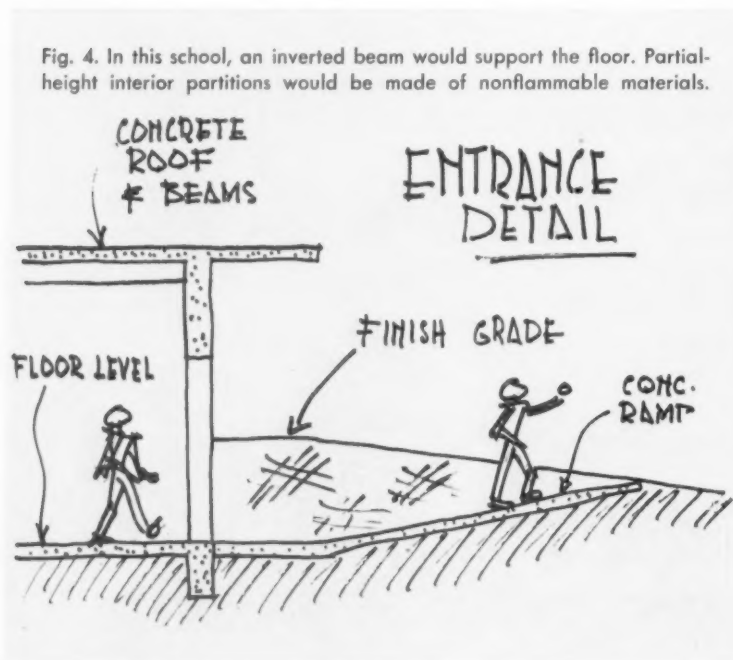


Fig. 4. In this school, an inverted beam would support the floor. Partial-height interior partitions would be made of nonflammable materials.

# JUMPING TO CONCLUSIONS

**Statistical data often are interpreted erroneously;  
averages may be irrelevant, assumed causes may be  
false, or prejudices may intervene**

**FRANCIS G. CORNELL**

*Educational Consultant, Engelhardt, Engelhardt, Leggett and Cornell*

IN A preceding article I illustrated some of the more obvious ways in which people make "errors of fact." It is convenient to think of another category of logical booby traps which must be avoided by both producers and consumers of statistics. These we put under the heading of "errors of interpretation." Previously I discussed critical questions about the meanings of *data*; now we look at problems of drawing conclusions from data.

One of the first mistakes that can be made in the interpretation of data is to fail to take into account all of the questions I have already discussed regarding the validation of the data themselves. So, in a sense, my system of classification is only a matter of emphasis, for, in actual statistical thinking, the interpretations, meanings and conclusions can be derived only in conjunction with the kind of dependability we can place upon our basic information. After all, our interest in statistics is a functional one—an interest in statistics as a tool, as an instrument of inquiry. Therefore, we view with considerable lack of interest educational facts collected for the sake of facts or because somebody started collecting such facts years ago. An interesting speculation has to do with the amount of time and energy wasted in schools and school systems in assembling facts of dubious functional value. Our first type of error of interpretation will therefore have to do with facts.

**1. Irrelevant Data.** There seems to be an infinite variety of ways in which people can cite, from an authoritative source, information which seemingly proves a point but which, in reality, has little to do with it. Of course, different kinds of invalid measurement discussed earlier, such as the "incorrect yardstick," or failure to establish the comparability of data, yield the "so what" statistics.

The most convincing argument used with legislative bodies and school boards about problems of school building planning, financing schools, school organization, the curriculum, and teaching personnel problems is one based on a survey showing *average practice* throughout the United States, or in similar types of districts and the like. Such information on what other schools do may be important to a local school board. However, most frequently these data are used as a *norm* or as a means of setting a *standard*. Anyone who is familiar with the pitiful inadequacies of thousands of classrooms will view with skepticism the use of average practice as a criterion of what ought to be. Surveys showing *what is* are very useful in giving us "actuarial" information. It is logical, however, that decisions about individual school systems should be based upon designing and planning for the purposes and needs of the people in the individual community—not the mythical average community.

There is a danger of making the statistics that happen to be available

the criterion without first establishing the philosophy of the school, stating the objectives, formulating the goals, and only then seeking the data which are relevant to the purposes set forth. The same thing is true in working with pupils or students in a classroom. If the objectives are pupil growth, improvements in social habits, attitudes and ability in reasoning and critical thinking, achievement should be measured as nearly as possible in these terms and not by the most available test or score, particularly if this should be data on memory or simple recall.

In viewing schools and school systems, we must guard against the misuse of "actuarial" information for "clinical" purposes. A test norm is a sort of average. There may be enough demonstrated correlation between a test of academic aptitude and school achievement to yield "achievement expectancies" on various levels, but individual schools with their unique school populations and their own sets of educational objectives are the exceptions that prove the rule.

**2. The Glittering Generality.** Statistics are often misused in simple syllogisms. Many persons are "categorical thinkers" and otherwise violate rules of logic in a way that results in jumping to conclusions. You no doubt know many persons of this type. Persons with certain features, persons of certain body types, persons of a certain race, religion, nationality or social class

—such persons who have appeared to be aggressive, or dull, or impulsive, or who have possessed some other behavioral characteristic—often become the prototype by which other individuals who may be classed likewise are judged.

Many prejudices are formed by false generalization on restricted observations. Pupils are often discriminated against in marking and promotion because of this error. It also may influence the way in which administrators and school boards select teachers. This type of error in interpretation yields invalid guides or standards for the operation of schools, arbitrary standards which actually may impede progress of schools—standards bearing upon what to teach, how to teach, where to build a building, how to build the building, how to assign pupils, and so forth.

The difficulty in generalizing from a single set of observations is one of the reasons the science of statistical method is worth a block of time in the curriculums of our teacher training institutions. Considerable progress has been made in the development of statistical methods which help a person guard against this pitfall in planning investigations and in making use of statistical conclusions.

Many of the errors in this category are treated by the statistician under the heading "sampling" or "statistical inference." One type of blunder is to generalize from an *inadequate* sample. A palliative which was effective for one person during one instance of distress has been assumed to be a cure. That is to say, a generalization has been made on the basis of only a single observation.

Then there are frequent instances of the *sample that is not a fair sample*. There are important conditions which the statistician would demand for a group of individuals to be a fair "sample" of a population. Very often the subjects for a study are chosen, as a matter of convenience, from the nearest elementary school or a class the investigator happens to be teaching. Such a choice is probably not fairly representative of the larger population which is the real object of study, and the investigator is logically restricted to conclusions regarding the sample itself, no generalization whatever being justified.

Results of a questionnaire distributed to all high schools in the state of New Jersey, but of which only 35

per cent were returned, would produce information upon which the researcher could generalize only with serious uncertainty. The 35 per cent of high schools is a group *selected* on unknown bases. They represent a "chunk" and not a fair sample. If the objective of an opinion poll is to learn the attitudes of the adult population in a community toward some educational question, interviews with only those attending P.T.A. meetings would not provide a fair sample of the adult population of the community.

### 3. False Cause and Elusive Factors.

One of the commonest types of erroneous statistical conclusion is to suppose a cause and effect relationship between two variables observed to be related. The mere co-variation of measures does not guarantee functional interdependence of the variables. When one is dealing with the relation of two or more measures, the "facts" *do not* speak for themselves. The possibility of a genuine functional interdependence between the variables must meet the test of reasonableness. We may find, for instance, that, as sales of tobacco have increased, teachers' salaries have increased. Except in a tobacco growing area, increases in teachers' salaries are hardly *caused* by increases in sales of tobacco. What is missing in the picture is a whole complex of other factors which are common to both variables. There is no direct functional relationship between the two, but both are consequences of the development of the economic activity of the country. This in turn makes possible larger national income to support both education and expenditure and changes in the desires and wants in our culture, permitting the increases in school attendance and holding power of our schools as well as increases in the consumption of cigarets and tobacco.

The real cause must be found, and hidden factors must be accounted for. An educational researcher could set up an experiment comparing some new method of teaching arithmetic in "experimental" classes with so-called "control" classes in which arithmetic is taught in the usual manner. If the experiment is not designed in such a way as to take into account many factors which may affect the results, the researcher may falsely attribute to the *new method* the superior gains in achievement which

he finds in his study. The superior achievement of the experimental group may be the result of the greater enthusiasm and higher motivation of the experimental teachers or, as often happens, the selection of *exceptionally able* teachers for the tryout of new materials or methods. Then, too, the classrooms in which the experiment is taking place may be those in which there is a greater emphasis on, more time for, and more practice on arithmetic.

**4. Hidden Values.** In arriving at conclusions from figures or statistics, individuals are purposely or unwittingly prejudiced by their own value systems. Frequently, the overzealous and careless researcher is inclined to color his interpretations by his own hopes, beliefs and expectations.

A *New York Times* report on a test given to college students on American and world geography gave the percentages of college students answering the several questions correctly. Fewer than half knew the population of the United States, that Nevada was the smallest state in population, that the Coulee Dam was in Washington, or that when it is noon in New York it is 5 p.m. in London. The chances are good that one whose philosophy of education leans toward the academic and classical would consider these results as evidence that our educational system is sagging. On the other hand, the "experience" curriculum advocate or the supporter of other theories of education would consider the same facts as irrelevant. The latter would point to many objectives in education, important in his opinion, other than memorization of simple fact. So we see that the way people interpret data is often a product of predilections, feelings, attitudes, beliefs or stereotypes.

Some of the classical fallacies in reasoning that produce biased conclusions from evidence may be recognized from the study of logic. These are:

*Argumentum ad hominem.* Attacking the person who submits a proposition rather than attacking the proposition.

*Argumentum ad populum.* A direct appeal to popular prejudices or "the gallery."

*Argumentum ad misericordiam.* A play on emotions through an appeal to pity and popular sympathy.

*Argumentum ad verecundiam.* Appealing to authority or justifying and



Fig. 1. Number of children born to residents of City X, 1940-54.

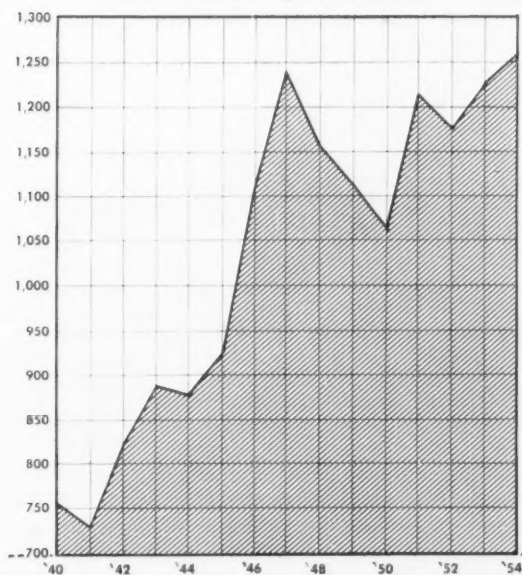
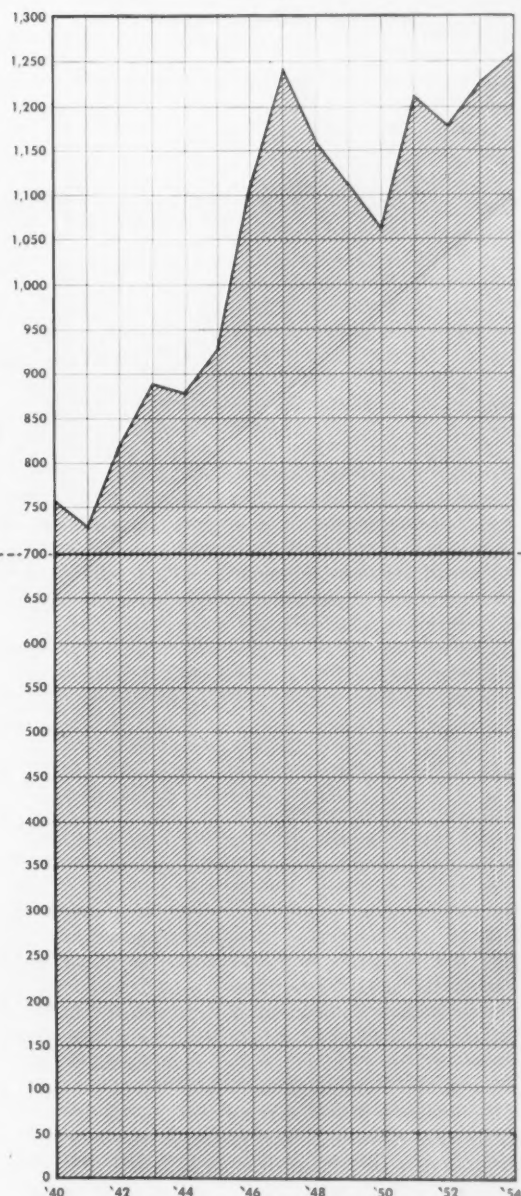


Fig. 2. Number of children born to residents of City X, 1940-54.



Do these two charts convey exactly the same meaning? Both charts simply show that births have increased with some irregularity. In Figure 1 the scale begins at 700, making the births in 1954 appear to be many times births in 1940. In Figure 2 the scale begins at zero, showing the true relative numbers by years.

validating an idea by quoting an authoritative person or group.

An important device of the propagandist is an appeal to prejudices, fears, hates, idealism, love, religion or patriotism or to the sense of justice, pride, hope or courage. He makes this appeal by the use of invective and "name calling" or by denouncing persons, causes or ideas with emotionally charged words, or by establishing a psychological connection between what he is presenting and something esteemed by his audience.

Highly difficult research technics

are important today. However, it probably is unnecessary for a great number of persons directly concerned with the development of educational programs to attain high levels of proficiency in complex methods of scientific inquiry. On the other hand, it is not expecting too much for large numbers of persons engaged either in research or in programs of action to be familiar at least with the sense of the foregoing ideas.

If both technicians and practitioners think along the lines of the logic of the scientific method, groups consist-

ing of professional persons and laymen working together in problem solving situations can be more effective. They will know enough about the ways of *improperly* supplying evidence. Effective decisions can be made as to when an expert may be needed to assist in technical research problems. Minimum essentials of critical thinking applied to the data of school programs and school systems should move the decision making processes of school organizations forward toward more purposeful goals more efficiently reached.

**Your job isn't to keep the peace  
by acting as mediator between pressure groups.  
That's what you'll be doing if you accept**

## ***The Agrarian Myth in Administration***

**JOHN A. BARTKY**

*Professor of Education, Stanford University*

**P**UBLIC school administrators, like many American liberals, suffer from a nostalgia for the rural way of life, glorified in the political philosophy of Thomas Jefferson. Through spectacles excessively tinted with agrarianism, they see asphalt streets as green pastures and selfish, uncompromising pressure groups as mild, public spirited individual farmers. They persist in a belief in the agrarian myth, which suggests that a huge, unwieldy urban school district may be governed as a small rural one-teacher school was.

It is a truism to insist that all public school administration must be democratic, but a democracy conceived in and dedicated to a rural culture is not necessarily applicable to an urban one. Even the language of democratic agrarianism, "local control," "individualism," "grass roots democracy," may not be understandable to the city slicker.

One of the absolutes of the democratic agrarian myth is that all citizens have a right, and must be encouraged, to participate in public school administration. What is envisaged in this precept is a small participating group of individuals whose honesty and integrity have been tempered in the hard struggle to overcome the soil and who, because they have common purposes and common interests, can reach reasonable solutions to problems without becoming involved in prejudice and conflict. It is reasonable, just and democratic to suppose that such a group can develop policy that benefits society and its schools.

However, when the number of those eligible to participate in public school administration becomes so large that face-to-face discussion is not feasible

and when the personal involvement in issues becomes so strong that consensus is impossible, then the schools no longer can support a direct participating approach in administration. The agrarian concept of democracy, no matter how much it is desired, must be dropped, and a constitutional representative form of control must be introduced.

Although the literature in public school administration still speaks in glowing terms of community participation, it must be noted that the drive is for larger and larger administrative units offering less and less opportunity for the voice of the individual citizen to be heard. There seems to be little chance that the large city will plow up its streets and tear down its factories in favor of a small school district. There is even less chance of the school administrator's favoring a small tax base rather than a larger one in order to get more community participation.

### **WHY WELCOME PRESSURE GROUPS?**

Unfortunately, despite these facts, belief in the agrarian democratic value of direct participation in school administration seems to persist. School administrators in large districts pressured by agrarian minded professors of education, blasted by the literature, and pressured by liberal groups in the community make a pretense at community participation in administration. Unable to invite all into this effort, the school administrator creates a new representative democracy within the framework of the one he already has. He often brings in only representatives of those who are loudest in their protest about what he is

doing and who exhibit the greatest obstructionist tendencies. He frequently disenfranchises the cooperative and the silent. He gives the impression that every pressure group has a moral and democratic right to make itself felt in the administration of the schools and that this is democratic participation.

Now, the representative of a pressure group in discussion with other representatives from similar organizations is not likely to behave with the same sincerity of purpose or the same desire to come to a truthful conclusion as the Puritan farmer in a New England town meeting. He owes his loyalty to a group with a single-track mind that would disown him if he exhibited any signs of deviation. He has no mind of his own, and he is not permitted to compromise with others. When representatives of pressure groups are invited to participate in school administration, the almost inevitable result is conflict and stalemate.

The Newtonian laws of force may be applied to pressure groups. For every pressure group forcing a certain cause there is an equal and opposing pressure group forcing an antithetical cause: Opposing those who want religion in the schools are those who want secularism; opposing those who would spend more on the schools are those who would spend less; opposing those who desire to participate in administration are those who do not want them to participate. The school system in the epicenter of these opposing forces is like the bird that wandered into a badminton game. The superintendent who is naïve enough to believe he can reconcile these forces

by inviting them to participate in administration is a lamb inviting wolves to dinner. Pressure groups should fight their battles in the arena of public opinion, not in the classroom, in the superintendent's office, or on the school page of the local newspaper.

The school district is governed by a board of education duly selected through the democratic process. It is in the selection of this board that the citizen exerts his participatory rights. Any other invitation to participate is extralegal.

The superintendent takes the cue for his behavior from the board of education, no one else. He is not empowered to look to some unofficial body for guidance because it has reached a consensus that satisfies itself

(while at the same time it ignores the wishes of a silent and conforming public). The job of the superintendent is not to keep the peace by acting as the mediator between pressure groups. It is his job to indicate to the group what the majority wants and to assume the majority is right just as long as it does not interfere with the prerogatives of a minority.

The politically minded superintendent who ignores the majority while he caters to a noisy minority is inviting personal disaster. A noisy minority must attack something. When it has won its point and has nothing else to attack, it will begin on him.

It is time for school administrators to stop creating new political agencies in the name of local participation in administration. (There is no provision

made for community participation in school administration in any charter of any large city district.) If he wishes to create a new political agency, let him begin at the right place by first modifying the law. His oath of office prohibits him from circumventing it.

Those who favor a new political organization for the schools tend to attack the superintendent rather than the law. If the existing control of the schools as legally defined is not satisfactory, let us change it. We dare not ask a superintendent to defy the law in order to gratify our desires for community participation in administration. Neither may we let our idealism in this realm so deviate from reality with respect to organization and people that it becomes meaningless and impossible of implementation.

## ***Salary Schedules Are a Compromise With Ignorance***

**FREDERICK L. REDEFER**

*Professor of Education, New York University*

**D**OES good education depend solely on the relative levels of teachers' salaries? Are salaries that important or do they become so because other elements in personnel relations cannot be expressed in such concrete terms and, therefore, salary disputes become the whipping boy for something broader and perhaps deeper?

Some teachers to their last hour of teaching make teaching a thrilling, exciting profession. Others start with much promise only to lose educational momentum as they go up the salary ladder. What is it that makes so many of them productive contributing teachers—some with degrees, some without, some married, some not, some high on the salary schedule, some not? What are some of the factors that make only some of these teachers productive professional workers? What is it that makes some of them give only a part of their potential contribution—some with degrees, some without, some high on the sal-

ary schedule, some not? Aren't these the important questions that need to be discussed along with next year's salary schedule? Aren't these the real questions to be discussed at the next meeting on educational personnel?

Industrial management has been concerned with similar questions. It too has faced these quandaries in dealing with the employment of human beings, and it has been concerned with the relationship of wage scales and the productivity of workers. Business management knows that all its personnel policies must be decided in relation to their effects on the production rates of workers. It knows that salary schedules are only a part of the total personnel picture which must be kept in mind in the solution of all its problems.

If whatever management does, even with all good intentions, affects adversely the productivity rate of the mass of the workers, then good business administration has been affected adversely. Consequently modern in-

dustrial management spends considerable sums to find out what are the factors that affect productivity, what are the factors that affect the relations between foreman and worker which in turn affect productivity, what is it that creates dissatisfactions among some of the junior administrative units.

The management of one of America's largest corporations justifies a large personnel research budget on the sole basis that, if you are employed by this corporation, the management needs to know a great deal about you as an employee. Personnel studies of many kinds are common to good business administration, and, while the results are not always conclusive, it is interesting that study after study shows more and more clearly that the human factor is important to morale, productivity and good management. Would this also be true in educational institutions, where the major item in the budget is for services given by human beings? Should school boards and superintendents consider the re-

sults of decisions on the productivity of teachers?

It is frequently stated that educational institutions and industrial enterprises are not comparable. At first thought this is true, but on second thought differences are not so sharp. Are tenure provisions for teachers and union requirements for dismissal so very different? Are there not human beings in both situations? Do not all human beings respond and react positively and negatively to similar influences?

It is frequently stated that industry can measure production, but how could the production of teachers ever be measured fairly and adequately? Production of the worker whose operation is purely mechanical and whose productive effort can be seen in material accomplishments probably can be measured. But, even with such workers, it is the human factors that affect his production. Industry has discovered that the same human factors condition the attitude of the junior administrator, whose productive efforts are not so easily measured, toward his work. While the instruments for measuring may not be so exact, management finds evidence that the administrator's production, his spirit, his willingness to give a first-rate performance in spite of difficulties are affected by similar factors.

#### TEACHERS UNKNOWN AS PERSONS?

Industrial management is vitally interested in the morale of all its employees. Educational administration professes to be equally interested, but policies and practices do not always bear this out. What is disturbing is that in the majority of schools the teachers are not really known as persons; personnel records are perfunctory, and personnel research is almost nonexistent. Teacher welfare is a curious mixture of kindness with an indefinite amount of charity. Few depth studies to find out what affects the teaching rate of teachers have been made. There is the need for some solid thinking about problems of educational personnel.

At the present time personnel administration in school systems presents a curious mixture of tradition, old wives' tales, untested assumptions touched up by economy and efficiency—a little bit of all of them and some of all of them mixed up in various practices. Most schools have salary schedules whose structural principles

are copied from other schools' salary schedules that are copied from other schools' salary schedules. Only the amounts change.

The assumptions underlying these schedules are a mixture of many compromises with ignorance. Some time back some assumptions were made and were built into a schedule. Then, schedules were copied and copied again until the assumption became lost in the practice. Some time back someone assumed that, with each year of teaching, teachers were better as teachers. Is this not the basis for employing an experienced teacher at a higher step on the schedule? But if it is so, is it so for all teachers? Do all teachers improve with each year of experience? Some time back someone assumed that, with further graduate studies, the teacher improved as a teacher. While this assumption might be true for "averages," does it necessarily follow for all teachers and for all studies? Some time back it was assumed that salary schedules should be based on the job, with no distinction between men and women teachers. This principle of payment for work done is applied to some parts of the salary schedule, but not to other parts.

An assumption basic for one aspect may be applied only to that one aspect and is not applied as a general personnel policy throughout. Salary schedules are built apart from the policies of selection, of granting tenure, and of separation. Is there nothing common to all? One personnel practice or policy may be contradictory to another and may be defeating to high morale and high productivity of educational personnel.

#### ONLY RESEARCH CAN FIND OUT

Board members and superintendents find themselves in a quandary because educational administration has not studied the factors that influence the degree to which teachers give of their potential skill and knowledge to teaching. It has been said that teachers know far more about what constitutes a good education than they actually use, but there are only wild guesses as to why this is so—or whether if it is true now it needs to be true. What are the personnel factors that make good teachers better teachers? This is the core of good educational personnel policies. This is the \$64,000 question school board members and superintendents would like answered when they sit about in executive meetings

and discuss the budget for next year and what is to be done about the demand for higher teachers' salaries.

Better answers could be forthcoming—at least better answers than we have at present—if board members, administrators and teachers took a realistic look at themselves and what influences their response to their professional employment. Better answers would be forthcoming if the total problem of educational personnel were discussed, if traditions and old wives' tales were examined critically, if some funds were invested in comprehensive researches about the largest single item in the school budget—school personnel.

#### BEFORE ADOPTING MERIT RATINGS

At the present moment there is almost an epidemic of adopting some form of a merit system that rewards the "master" teachers as a policy. What does a merit system do to the "productivity" of all the faculty? No one knows for sure. It might happen that a few teachers would receive more than their colleagues while the rest slowed down even more on the job. Would this improve the education of boys and girls—would it be wise policy? Why aren't all teachers "merit" teachers? If merit rewards are favored should they be only financial rewards? Are financial rewards wanted more than psychological rewards? How will such a system be administered?

It would be far better for board members and superintendents to look at the total problem carefully than to rush into a merit rating system or some other personnel practice, because school boards, like industrial management, may lower "the giving" of all teachers by unfortunate or hasty action. If this happens the educational returns on the money spent for educational personnel may be appreciably decreased; the returns for the community's educational dollar will be decreased no matter what the possible upper limits of the salaries of master teachers are.

These are questions raised only to urge comprehensive and thoughtful consideration for personnel policies and practices. What is it that makes a teacher give more of his skill and ability to the problems of the classroom? Is it a financial reward, psychological recognition—or what? Do teachers receive such basic satisfactions from their teaching? Do we know? We must find better answers. #



## INDIAN GIVERS

*Now the tribes increased and prospered*

*As the storks flew yon and hither  
And the dydee service doubled*

*Even in the smallest hamlet.*

*Then the icbabods and sachems*

*Pointed to their learning lodges*

*Which were filled to overflowing,*

*Cried, "We must have room or perish*

*Or else shoot the statisticians."*

*Cried, "Build bigger learning lodges,*

*Else we go on double session."*

*And the tribes, assenting, murmured,*

*"We shall tax ourselves the wam-pum,*

*Hire the Wendigoes, the Builders,*

*Get the Stinkwinks, the Bulldozers,*

*Build the needed learning lodges."*

*From the corners of the nation*

*To the banks of the Potomac*

*All the wise men met in council,*

*Came by boat and plane and Pull-man,*

*Came to wrestle with the problem.*

*Month by weary month they*

*argued*

*Speechified, vociferated,*

*"Hi-au-ba," the one group shouted.*

*"Way-ba-way," the other answered.*

*Meaning, "This is high explosive,*

*Let us not blow up our fences."*

*Then at length, without agreement,*

*Wearily, they wended homeward.*

*All their gabble and their chatter*

*Failed to build one single wig-wam,*

*Failed to gas a single Stinkwink,*

*Failed to make one lodge of learning.*

*And the storks, who had not beeded,*

*Got themselves some jets and*

*rockets,*

*Went about their usual business.*

## MORAL OF THE MONTH

THE INFLUENCE of a teacher or a school administrator can completely change the life of a child. Sometimes, in the wear and tear of a hectic day, we are likely to forget how a single incident will make or mar a career. Only today I received further confirmation of this truism.

Some years ago when I was a brash young school superintendent and "opportunity" classes were just coming into style, I started such a class in which Helen Boggs was promptly incarcerated. After much testing and

## Chalk Dust

FREDERICK JAMES MOFFITT

Chalk Dust, whose Indian name is Akwasasne, sits confidently on the Superintendential Throne awaiting an appointment with Mrs. Busty. With his turtle shell rattle he will drown the conversation when it becomes too confusing. The war club is on his desk in case of emergency and argument. And who will win? Mrs. Busty, of course.



soul searching, even an unusually sympathetic teacher couldn't find much opportunity in Helen, and I was called for further consultation. Using the latest supervisory technics advocated by Teachers College, I searched eagerly for something to praise. It seemed pretty hopeless until my gaze landed upon Helen's drawing of a horse—the project for the day. The drawing actually looked a little like a horse so I praised it inordinately. Helen's eyes sparkled, her soul expanded, in a word she was motivated.

Several months later Helen's father called me. "What on earth have you done to Helen?" he shouted wrathfully. "All she does any more is to think horses, dream horses, and live horses. Her room is decorated with palominos and barebacks instead of movie stars. I have had to buy her a saddle and two nags."

"Don't worry," I said soothingly. "It's only a phase."

The man neighed at me desperately and hung up.

That was 15 years ago. From time to time, I heard vague rumors of Helen, but I tried not to listen. In today's mail, I received a colorful post card from a western state. It showed a picture of a trotter being piloted by a rather horsey young woman. Underneath was an explanatory legend: "Helen Boggs," it read, "the leading lady jockey of the West—total winnings over half a million dollars." The card was signed, "Affectionately yours, Helen."

I guess there is no particular moral to this true story—unless it is hitch

your wagon to a horse or something. But I shudder to think what might have happened if that early artistic effort I praised so highly had been a drawing of an elephant or even a guppy.

## SUPERINTENDENT'S REVERIE

PROBABLY INSPIRED by some company promoting acoustical ceilings, a school superintendent in the Midwest is reported to have started an anti-noise campaign in his school. If he is successful the position here in Sugartown, which I am leaving by request, is his for the asking. Sugartown has reached the progressive point where even an admonitory shh is frowned on because it might break the children's spirits. As a result, I do most of my homework in the local stone quarry, just to keep in condition.

Our schools in Sugartown would certainly delight old King Charlie IX of France, who started a school for hunting horns in his kingdom. Those students who could not be heard at least a mile away were flunked and had to repeat the course. Unfortunately, King Charlie was brought to his death bed with lung lacerations caused by over-tooting. Let that be a lesson to Mrs. Busty, who called on me today to argue about a site for the new school.

Historically, Louie XIV was also known for his horn blowing and boasted that he could toot a whole day without weakening. Could Mrs. Busty be his descendant?



## *A.A.S.A. Theme:*

**PAUL J. MISNER** will wield the gavel at the 1956 convention of the A.A.S.A. Officially, he took office as president on March 15, 1956. He has been superintendent at Glencoe, Ill., since 1935.

**I** WELCOME this opportunity to extend greetings to my colleagues in school administration and to give you a brief report on current plans and activities of the A.A.S.A.

During recent months it has been my great privilege to visit many communities across the nation and to observe at first hand the dedicated leadership and the solid achievements of school administrators in places both large and small. Everywhere I go I am profoundly impressed with the evidence that educational leaders are facing the future with statesmanlike courage and confident determination.

It is quite apparent that the problems of increased school enrollments, teacher shortages, building programs, and financial dilemmas no longer frustrate and intimidate us. I sense a stubborn determination to take these problems in stride and to recognize in their solution an unparalleled opportunity for educational leadership. Unless my observations are woefully distorted, I predict that school administrators are prepared to exercise a quality of leadership that will make the next decade one of the most glorious eras in the entire history of public education.

I am happy to tell you that the members of the executive committee and the officers of the A.A.S.A. share my optimism and enthusiasm for the future. We are seeking to do everything we can to make your association a dynamic and useful source of professional service. A planning committee composed of representative edu-

cational leaders has been appointed and is now at work formulating a long-range program. While all of us can be justly proud of the past achievements of our organization, we know that current programs and services must be re-examined and re-evaluated to meet changing needs and conditions. I have great confidence that the planning committee will present a report at the Atlantic City meeting in February that will be of great interest and considerable importance to all of us.

The Committee for the Advancement of School Administration is directing its attention to the summary, interpretation and dissemination of the results of the five-year Cooperative Program in Educational Administration. For the first time in history we have been able to make, through this extensive research effort, a conspicuous beginning looking toward the professionalization of school administration. Certainly we can all agree that the future effectiveness of educational leadership in the United States clearly demands that the competencies, responsibilities and unique rôle of the school administrator be more adequately and more completely defined. The officers of your association are determined that every possible effort will be made to utilize the results of the C.P.E.A. to place the position of school administration upon a truly professional basis.

There is probably no single activity of our association that requires more thoughtful and time consuming planning than the national and regional conventions. At the present time we are concentrating our attention

# *Schools on the Threshold of a New Era*

on the meeting to be held in Atlantic City February 15 to 20. The theme for the convention will be "Schools on the Threshold of a New Era." As the theme suggests, we have decided to focus major emphasis at the convention upon the implications *for education today* of the world of tomorrow. On the general session programs we plan to present recognized leaders from the fields of science, technology, government and the professions. We are asking these speakers to project for us "the shape of things to come" and to help us interpret the new and increased responsibilities which the nation's schools must inevitably assume. Among other matters of interest the general session programs will give special consideration to such important topics as automation, communications and foreign relations.

Because laymen and professional educators all agree that the financial support of schools must be vastly increased, one general session will be devoted to a realistic consideration of the topic, "Where Shall We Get the Money to Finance the Schools We Need?" Three distinguished economists have agreed to participate in a panel discussion designed to explore the answer to this crucial question.

You will recall that last year an extensive evaluation was made of the Atlantic City meeting in an effort to determine how effectively the programs were meeting the needs of our members. The results of the evaluation are being utilized in the planning of our special interest groups. Many of you indicated interest in groups concerned with the improvement of instruction. For this reason plans are being made for discussions dealing with the gifted child, reading, mathematics, science, guidance, counseling and other topics related to curriculum improvement at both elementary and secondary levels. In response to a continuing demand, provision will be made for groups dealing with television, personnel problems, school building trends, finance and school-community relations.

Reactions of members indicate that many enjoy the formalities that are customarily included in the general session programs. Others suggest that introductions of guests, greetings and extended presentations of speakers

be abbreviated. In an effort to please everyone, we are seeking a middle course somewhere between the exhibitions put on by the Democrats and the Republicans in their recent conventions.

The evaluations made last year indicated considerable approval of some of the experimental technics of small group discussion that were employed. Our plans for next February include, therefore, panel discussions, structured interviews, case study reports, demonstrations and extensive use of audio-visual presentations. If some present plans materialize, we hope to make use of closed circuit television in the presentation of a few major topics.

As our plans are now developing I can confidently promise you an inspirational and a profitable meeting in Atlantic City in February. Our paths may cross before the February convention; otherwise, I shall be seeing you then.



PAUL J. MISNER

Boardwalk at Atlantic City.



# A Parent's Report on a Parent Conference

LESTER J. GRANT

Superintendent of Schools, Decatur, Ill.

FOR several years we have used the parent conference as one means of reporting to parents. Teachers have had no released time for these conferences. As a part of our study of the total problem with possible use of released time being considered, parents were asked:

1. Have you found these conferences worth while?

2. Would you like them continued?

Out of approximately 2500 parents who were polled 1882 returned replies with 1786 answering Yes to question No. 1 and 1761 Yes to question No. 2.

A few made short comments, but one parent returned the enclosed statement which she had written after returning home from the conference. At that time she did not know the questionnaire was coming from the school.

Her statement read significantly:

Today was my first "conference with teacher." Pat, my 7 year old daughter, is in the second grade, and, since the conference system of reporting to parents has been in effect at Southeast School previously, I should be a veteran of the conference. However, we are transfers from another part of the state and up to now have not learned what the "conference" involved.

I received my "summons" yesterday, and so had time to arrange for a baby sitter if I desired and to catalog my questions, comments and preconceived notions.

My questions would be trite. Is Pat doing all right? Can I help at home in any way? How seriously have her frequent absences hindered her progress? We have so recently moved that it is necessary to return several times to our home to tend to unfinished business. My comments would include the usual "I don't see how you handle them so well . . . . Pat certainly likes her school . . . . Wouldn't it have been wonderful if schools had been this attractive years ago when I went to school."

My preconceived notions would be based on my experiences as a teacher under the old report card system. Being familiar with the conference form of evaluation only through professional articles and institute meetings, I had yet to see it in actual practice. I expected the session to be a little forced and unnatural, with the teacher politely weighing each word.

I'm home now. My conference is over. An entire new understanding of Pat's school life is mine and this morning proved to be one of the nicest experiences I have ever had. Joyously I think back over the morning.

## WHAT SHE LEARNED

It was 8:30 a.m. when I entered the classroom and saw Pat's teacher arranging the room in preparation for the children. She smiled as she welcomed me, and immediately we settled down to our discussion. She said some lovely things about my child, pointing out her achievements. She explained the part of work that Pat found more difficult and how she had given individual attention in such cases. She mentioned the group type of adjustments Pat had to make since I seldom had the opportunity to observe Pat in large group situations. She showed me some of my child's work and explained to me how it compared with other unnamed children at her level. I could then judge Pat's work in relation to the work expected of that grade level and her own aptitudes. I saw what satisfactory and unsatisfactory work really included. These I had not fully understood from the pigeonhole system of the report card. We discussed freely the training of this child, she from the standpoint of one who saw Pat in group life and under the educational regimentation necessary to carry on a school system, I from the standpoint of one who usually saw Pat in the freedom of the home.

Soon it was time for school. I feel that I am familiar with classroom procedure. But never have I seen such adjustment to the morning happenings. The children came in quietly and happily, noticing me but not allowing my presence to interrupt the routine.

I was especially alert for a little thing. I knew the temptation for a teacher to be on company behavior in front of "Mama." I watched the children and saw the united respect they showed as the assignments were announced and explained. I saw the genuine interest of the teacher as she patiently helped the problem child with the same devotion she gave the more capable.

But in this room I saw something that makes me glow: sportsmanship. This teacher had radiated a fairness so genuine that each child dropped his defensive air and relaxed to enjoy the challenge of competition, each doing his best, none fearing ridicule if *his* best was not *the* best. For instance, a group including Pat went to the chairs placed for group work. The teacher showed flash cards with the combinations of subtraction. If the child said the correct answer first he could work toward a desired chair. Even in cases I would have considered a very near tie, the children discerned the winner and happily moved to make room for the winning competitor.

Finally it was time for me to excuse myself. I left the room peacefully confident that Pat's progress would continue according to her own ability and limitations but that this progress would be under a skilled hand.

## HAS ONE SUGGESTION

Am I in favor of the conference?

Yes, through the conference I found out that I could feel at ease over the schoolroom situation. If I had not been pleased over the teacher's procedure or the child's advancement, I had a chance to suggest and to receive suggestions.

Second, I could place my child in her group and visualize the advancement expected of her, considering her specialties and limitations.

Third, I had the opportunity to express my appreciation to Pat's teacher for her skill in helping my child develop academically and emotionally.

However, I do have one suggestion. It would have been nice to have had some written form of report to take home to Pat's father. Since he missed the personal touch of the conference, he had to be content with a secondhand report from me. #





Pupils in the public schools of Shorewood, Wis., are hearing themselves as others hear them by means of a tape recording. Their attentive faces are typical of pupil reaction to such recordings.

**AUDIO=VISUAL**

Conducted by Walter A. Wittich

## **THE TAPE RECORDER**

**BREAKS BARRIERS  
REPEATS HISTORY  
SAVES TIME AND TEACHERS  
TEACHES AGRICULTURE**

On the following pages, four authors take a comparatively new instrument, the tape recorder, and show how they are using it as a teaching device in their local school system or classroom. It is up to the school

administrator—superintendent, principal or supervisor—to find out exactly what values there may be in such a new item of equipment and to encourage his teachers to use it for definite instructional purposes.

## THE TAPE RECORDER

### BREAKS BARRIERS

ALEXANDER FRAZIER

*Assistant Superintendent in Charge of Curriculum and Instruction, Public Schools, Houston, Tex.*

ONE lesson administrators have long since learned is that the mere provision of new or unfamiliar teaching equipment does not guarantee that the equipment will be used well or widely. New teaching devices usually are taken out a few times by teachers who try such materials on principle or by those for whom gadgeteering has a certain fascination. Many times we find teachers lose interest in using the equipment because they lack the know-how for using it.

Most teachers ask a sensible question when confronted with new teaching devices: What is it good for? Unless this question is answered intelligently, the likelihood is that the new item will remain in the storeroom. In fact, do we want teachers to use equipment or material because it is new, or should we expect them to use it only as it promises to give them greater assistance in achieving their educational goals?

#### WAYS TO HELP TEACHERS

Take the tape recorder, for example. Here is a comparatively new instrument that seems to have many possibilities. What can we do to help teachers find the best uses for this device?

First, we can make it easy for teachers to use the new equipment. They

must have enough good tape recorders and tapes to use the equipment efficiently and effectively, and they must have the basic knowledge to operate the recorders.

Second, it means providing good recordings to play on the tape recorder. Fortunately there already is a sizable literature of tape recordings available to schools. The Minnesota Department of Education, St. Paul, has collected an extensive library of educational recordings. Its catalog, "Tapes for Teaching," lists many selections you may choose to have recorded on tapes you send in. Subdepots across the nation have been set up to house the same collection and provide a similar service.

In Texas, for example, we obtain a wide range of teaching tapes from the state education agency, Austin. Hundreds of recordings are available from this source, covering interests from the primary grades through adult study groups. For the cost of the tapes themselves and the there-and-back postage, a school may build its own library to meet its needs. Best of all, if it doesn't like the program or has exhausted its use, it may simply erase the tape and send for a new program.

The Department of Audio-Visual Instruction now publishes a national directory of schools and universities

providing educational tape recording services.

If such services are used, for the cost of the tapes themselves, plus a small service charge and postage, a school may build its own library to meet its own needs. Best of all, if you don't like the program or if you have exhausted its use, just send in the tape so another program can be recorded on it.

Third, the school may make its own recordings. It may record radio programs. It may record talks of recognized authorities for class listening and discussion. The school library of tapes may also include recordings of unusually able reports or dramatizations of students themselves. Teachers may lighten their load by recording such things as spelling tests, followed by answers, and dictation for typing classes.

Fourth, teachers can exchange successful experiences and techniques by means of tape recorders. Teachers who are reluctant to use the tape recorder will be encouraged by fellow teachers to try it. The "inservice training" can serve as a basis for cooperative exploration of the essential values of the equipment and for planned use in terms of these values.

Fifth, and as important as the first four points, working together to explore the virtues of new equipment will serve to give direction to proper future budgeting for the tape recorders and reels of tape and the efficient scheduling and use of the materials already available.

Teacher participation in study, selection, exchange of information, and efficient scheduling will ensure good utilization of equipment such as the tape recorder in schools. It is to explore these uses of the tape recorder that Opal T. Rosson, Frank B. George, and Richard Kraemer have pooled the ideas that follow, in separate articles.



Eighth grade history students at Houston, Tex., have a lesson in democracy as they dramatize events in American history for tape recordings in their own classroom.

In preparation for their "On the Scene" tape recording, the project groups listen to good historical records to get facts and program ideas.



**I**T REQUIRES extensive reading and research to understand the causes and forces behind historical events. Instead of relying upon a single textbook, the teacher must encourage the use of many books and a wide variety of materials. Students must assimilate ideas acquired from additional sources such as newspapers, films, recordings, tapes, radio and television.

How can the extensive reading and research program be planned so junior high school pupils will be sincerely interested in learning how to collect and effectively organize data for the solution of problems in history?

#### PLAN FOR EIGHTH GRADE CLASS

Here is a plan that has been helpful in my eighth grade American history classes in the John J. Pershing Junior High School, Houston, Tex.

My students discussed ways to improve our research reporting projects on a new unit which covered American history from 1776 to 1812. The class had listened to "The Signing of the Magna Charta," one of the C.B.S. "You Are There" series of recordings and to other similar radio and television programs and films. These experiences sparked the idea of producing their own dramatization of historical events for tape recordings right in the classroom. They decided to call their program "On the Scene."

The students established the following plan for carrying out the project:

1. Group leaders were elected by the class, and each leader chose several students for his group. Each group selected a topic such as "The Signing of the Constitution" for its work.

2. Each group collected information for its topic. Library periods were scheduled. Pupils used the card catalog, "Reader's Guide," and the table of contents of books to locate the information they needed.



The Houston junior high school pupils did much spadework on their American history series of recordings. They learned how to use library reference materials as learning resources for their project called "On the Scene," modeled on the well known C.B.S. "You Are There" recordings.

3. The groups prepared their scripts. They had to think through their problems, discriminating between the trivial and the important. They had to plan for the necessary continuity, music and sound effects.

4. When the important day for recording the programs arrived, each group performed with the remainder of the class looking on.

The over-all results of this unit of work exceeded our expectations. Some effects of the project are not of the type that can be seen immediately.

Those that can be tallied follow:

1. The project aroused the interest of the group.

2. It developed independence, initiative and self-reliance.

3. It stimulated a wider use and knowledge of resource finding techniques and library materials.

4. It improved television and radio listening habits.

5. It taught them cooperation.

6. It improved their speech.

7. It brought history into their own classroom for the benefit of all. #

#### THE TAPE RECORDER

### REPEATS HISTORY

OPAL T. ROSSON

*Teacher of Social Studies and Visual Education Coordinator  
John J. Pershing Junior High School, Houston, Tex.*

## THE TAPE RECORDER

### SAVES TIME AND TEACHERS

#### FRANK B. GEORGE

Supervisor, Radio-TV Education  
Unified School District, Long Beach, Calif.



Students can improve their pronunciation and enunciation as they study foreign languages with the tape recorder. Recording and listening to their voices reduce errors, encourage self-evaluation.

WITHIN the last 10 years tape recording has been made so inexpensive and simple that it can be used on a mass scale both at home and in the classroom.

Many teachers still do not take full advantage of the labor and timesaving potentialities of this educational tool. In addition to providing many educational benefits the tape recorder can be a full fledged assistant in the classroom, relieving the teacher of necessary routine work.

**Commercial Work.** A commercial teacher saves her voice and provides clear-cut dictation and directions at various speeds for her classes with the tape recorder. At the present time she has tapes with material ranging from slow to fast and from simple to complex exercises for her beginning and advanced typing and shorthand classes.

What Teachers Say They Like in Tape Recorders	
WEIGHT .....	25 to 30 pounds
OPERATION .....	Minimum number of controls. Many prefer push buttons to knobs.
DURABILITY .....	Well engineered and housed in a good carrying case
TONE QUALITY .....	Minimum speaker size, 5 inches
SPEED OF TAPE .....	3 3/4 inches and 7 1/2 inches (two-speed)
RECORDING TRACK .....	Dual track
FREQUENCY RESPONSE .....	60-7500 cycles per second at 7 1/2"/sec
CONNECTIONS .....	One phone jack for additional speaker
	One phone jack for recording from radio or record player
PRICE .....	Approximate list price of \$200
RECORDING TAPE .....	Red oxide plastic base (paper base not recommended). 1200 foot reels are more reasonable in price.

**Social Studies.** A teacher of five civics classes wished to have his classes visit city departments while they were studying local government. The problem was to involve many students and to iron out conflicts in the school schedule. It was solved by the selection of class representatives to visit city officials, record interviews, and take

35mm color slides of interesting field trip highlights. These representatives arranged the slides in proper order and tape-recorded a narration to accompany each set of slides. With these, they reported to their classes.

**School Building Plans.** An assistant superintendent of schools wished to obtain reactions of teachers to their new school. The information was important because constructive suggestions for changes would be incorporated in new schools to be built. The teachers were sent a questionnaire about the functional use of their building before the scheduled conference. A tape recording was made of the discussion with the teachers and custodians. A comprehensive report was summarized in a short time. The superintendent and the board of education made excellent use of the information.

**Homemaking.** A home economics teacher recorded recipes on tape, with care for moderate speed and good diction. When the tape was played back she noted the class listened more attentively and listed the information more accurately. The same tape was used for other classes. #

Recorder takes over study drill, freeing teacher to help individual students.

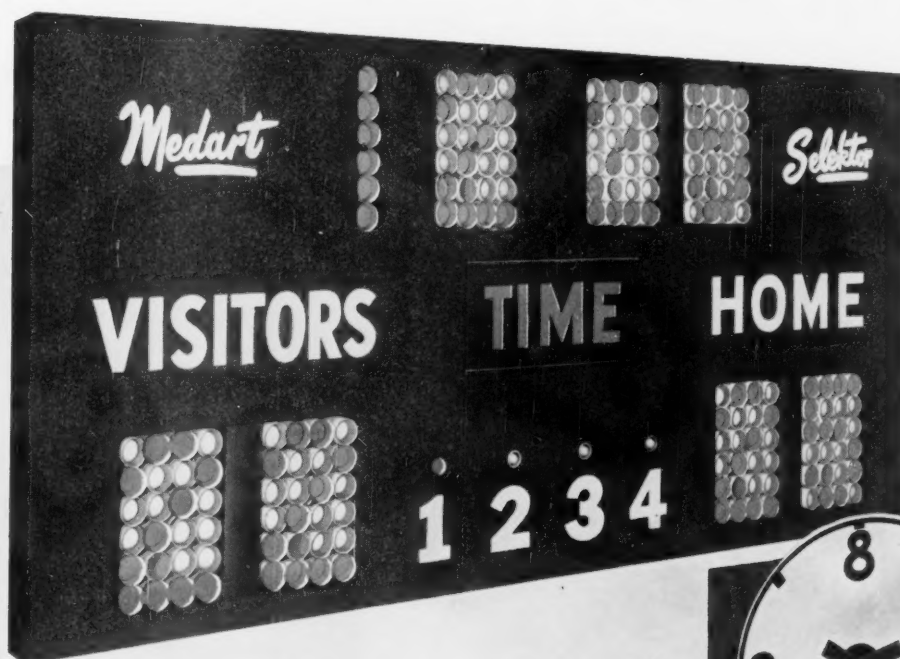




# Medart

## BASKETBALL SCOREBOARDS

.....the latest in scorers and timers!



### SELEKTOR® MODEL MB-900

No other scoreboard made, regardless of price, offers more in split second accuracy, mechanical dependability and easy operation. **AUTOMATIC** time recording in minutes and seconds with time left to play automatically diminishing in seconds. **COLORFUL**—“Time” panel is green during play; turns red during time out. Timing figures are green, scoring figures amber, quarter lights red. **SEPARATE HORN** automatically signals end of periods (or can be manually operated from control box). **HIGH VISIBILITY** anywhere in gym. Big 10" x 6½" numerals contain 24 lamps, each in reflecting tube. **QUICK RESET** can be made to any desired time. **POSITIVE CONTROL** by self-rcturning toggle switch type control box. **BIG AND RUGGED**—72" x 34½". Reinforced steel construction. Black wrinkle finish; other colors available. **EASY SERVICING**. All operating units of plug-in type.

### CLOCK TYPE MODEL MB-800

An excellent scorer and timer, 32" wide, 53" high, at a real economy price. **VISION TESTED NUMBERS**—10" x 6½"—made up of 24 amber lamps in bright reflector tubes. **BIG CLOCK** 25" diameter face, white baked enamel on steel. Available for 6, 8, 10 or 20 minute periods. Synchronous motor, dead stop brake. Timer stops automatically at end of period. **AUTOMATIC SIGNALLING** at end of period by extra loud portable horn. (Can be operated manually from control box.) **INSTANT CONTROL** from toggle-switch operated control box. **BUILT TO LAST**. Construction, all steel reinforced. Wiring comparable to highest priced scoreboards. Black baked-on wrinkle finish.



Everything big-time equipment should have *plus* extra features that make these scoreboards the game's best and biggest values. Tops in precision, speed and control simplicity. Write for Brochure.



SPECIFY the best, then INSIST on it!

FRED MEDART PRODUCTS, INC. • 3532 DE KALB ST. • ST. LOUIS 16, MO.

## THE TAPE RECORDER

### TEACHES AGRICULTURE

**RICHARD KRAEMER**

Department of Vocational Education  
Iowa State College, Ames

THERE are good opportunities for learning when radio or tape recordings are effectively used in vocational agricultural classes. An important value of tape recordings in this field lies in the ease with which authorities can be brought to both high school and adult groups.

Although "visiting authorities" are not present in person to explain or answer questions about their message, their presence in sound affords excellent resource contributions. A teacher can stop a tape presentation where and when he deems it appropriate and carry on a discussion. The flexibility of the presentation is in the hands of the teacher, who is best prepared to

recognize the type and extent of material that will be most effective with his group.

The utilization of a recording should develop from a definite need. For instance, a class period devoted to dormant spraying for the control of brush may arise from the teacher's observations of actual farm conditions in his locality. Queries to local or state college radio stations will usually bring schedules of farm subjects to be broadcast and available taped programs.

By simply connecting two wires from the speaker terminals of a radio to the appropriate recording input of a recorder, you can easily prepare

good quality recordings of radio programs. It is generally a good idea for the teacher to make the recording, since he then can take notes as a first step in determining which parts of the program to use in class and in what manner to use them.

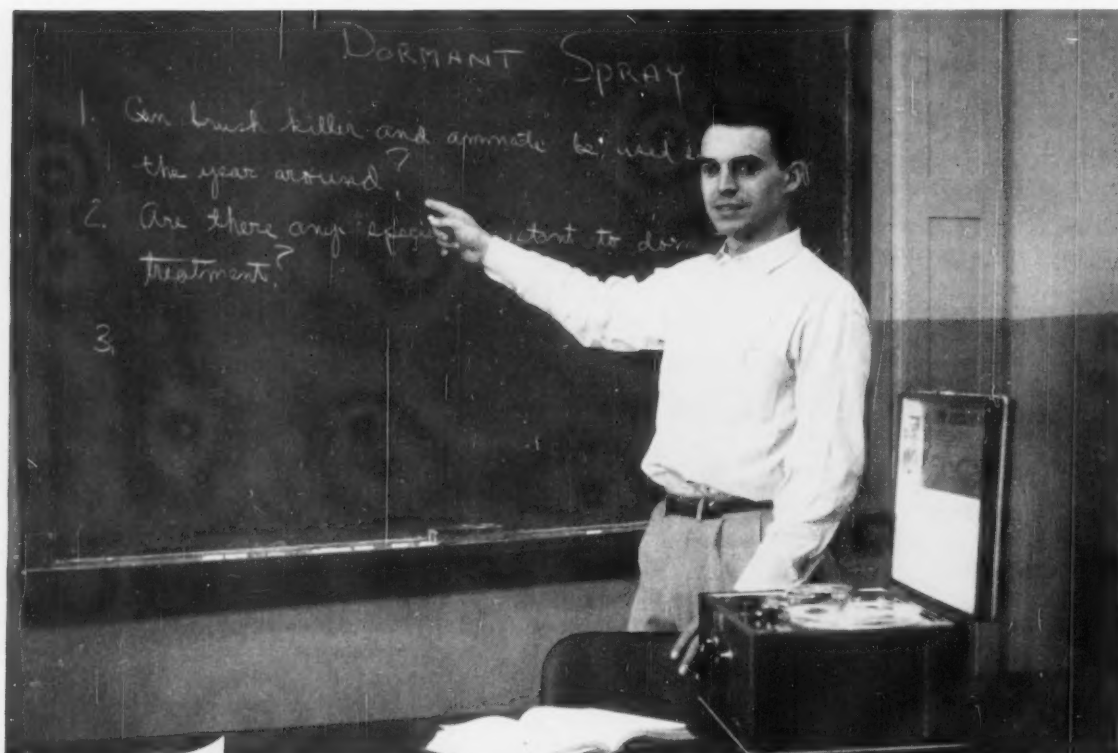
Motivate your group before using the tape recording. The teacher should develop a visual outline for the class to use as a guide. For example, with the topic of dormant spraying, the teacher may want to consider such items as the time for spraying, the type of solvent, and the factors that may interfere with a good kill.

#### ADDS VARIETY TO REALISM

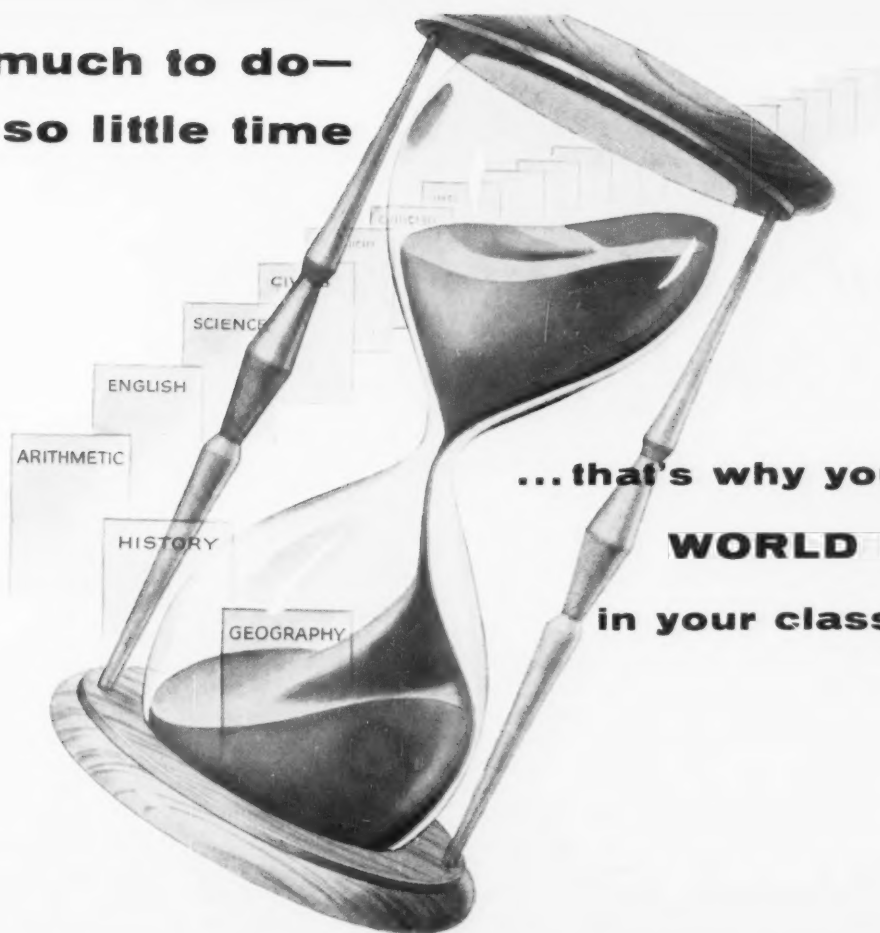
If the outline topics are originally suggested by questions from the students during the introduction and preliminary discussion, so much the better. You then have participation.

Why all this for just a recording? The audio presence of authorities adds variety and realism to the classroom, helping us attain our educational goals. The ease with which recordings can be obtained and modified allows easy adaptation to a specific subject, locality and group with a minimum of time and expense. #

Mr. Kraemer believes a tape recording is most effective only after the instructor guides the motivation of the class with questions and conducts discussion before and after the listening period. The topic of the day is dormant spraying.



**so much to do—  
so little time**



**...that's why you need  
WORLD BOOK  
in your classroom!**

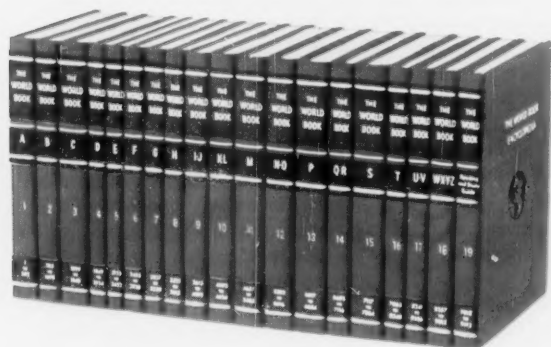
As you look at the faces in front of you, you realize the responsibility of having so much to teach in so short a time.

That is why teachers welcome the help of World Book Encyclopedia in their own classrooms. They find that World Book is more than just a reference work. Its many comprehensive articles enrich every subject taught. Even more important, World Book motivates students to read beyond the usual requirements of classroom work.

Each article contains modern and informative illustrations—pictures, diagrams, maps, and charts

that help to make your teaching more effective. An outstanding feature of World Book especially important to teachers is the scientific grading of each article for the class in which the subject is normally taught. This means that the material can be easily understood by students at every learning level while maintaining their highest interest.

For further details on how World Book can be a real help to you in your classroom, ask for a free copy of the new Mill Creek story, "Research Opens the Door to Reading." Write Mr. John W. Dienhart, Dept. 1410, Box 3565, Chicago 54, Ill.



## **WORLD BOOK** encyclopedia

Field Enterprises, Inc., Educational Division  
Merchandise Mart Plaza, Chicago 54, Illinois

## BUSINESS ADMINISTRATION

MAINTENANCE AND OPERATION • PURCHASING  
ACCOUNTING • SUPPLIES • EQUIPMENT

Conducted by  
Bernard R. Oosting

# Legal Authority for Paying Dues From School District Funds

and a comparison of principles and practices

JOE V. McCLAIN

Assistant Superintendent in Charge of Educational Services, Ranchito School District, Pico, Calif.

UNDER what circumstances can public school funds legally be used for payment of membership dues in local, state and national organizations, either for the district as a unit or for its board members and employees? Need for clarification on these expenditures was the subject of a nationwide survey I conducted under the sponsorship of the Association of School Business Officials of the United States and Canada.

The study was made under the direction of S. C. Joyner, business manager, Los Angeles city schools, and D. Lloyd Nelson, professor of school administration, University of Southern California.

Two different questionnaires were used for the survey. One was sent to each of the 48 state school superintendents, and the other was sent to the school business managers in the five largest city school districts in each of the 48 states. Responses were given by all of the state superintendents and by 71 per cent, or 171, of the business managers.

The study also included an evaluation of 13 suggested criteria for policies regarding the payment of membership dues. The criteria were submitted to a jury of 50 specialists representing nine different areas in education and related organizations.

Survey results showed that the majority of school districts in the United States have the necessary legal authority to pay membership dues for the school district and board in profes-

sional organizations. The majority of school districts can also legally pay membership dues for their school boards in local, state and regional school board associations.

However, the lack of specific legal authority pertaining to membership dues in some states has led to many inconsistent local board practices, and in some cases it is possible that public funds have been spent illegally.

In a few states, the state school superintendents and the local boards of education are not in complete agreement as to the interpretation of the general state school statutes regarding the use of public funds to pay membership dues in professional, civic and service organizations. In nearly every state, the practices of school boards concerning payment of all types of membership dues are inconsistent.

It is interesting to compare the practices of municipal agencies with those of school districts. Most municipal agencies do pay membership dues from public funds, which would indicate that perhaps some states and local school boards are too conservative in their policies concerning payment of dues for membership in professional organizations.

### Specific Findings in Regard to Legal Authority

1. Forty-six states have no specific statutes dealing with payment of employees' dues.

2. In seven states legal authority is granted to pay district dues in profes-

sional organizations; such payment is illegal in three states, and 38 leave this to the discretion of local boards.

3. Sixteen states have laws authorizing districts to pay the dues for local boards in the state school board associations; a court decision grants this authority in one; legal opinions or state policy rulings affirm the practice in eight; 17 states leave the matter to the discretion of the local boards of education; three consider such payments illegal expenditure, and three have no state school board association.

4. Eight state school superintendents have issued policies or directives dealing with membership dues.

5. Thirty-nine states have no specific legal authority, rulings or opinions dealing with the payment of individual dues.

6. In none of the states is there specific legal authority to pay dues in civic and service organizations.

7. The expenditure for yearbooks, publications and research services is considered by state school superintendents to be legal in all 48 states.

8. The payment of dues in professional organizations for the school dis-

Opposite Page: On the jury that evaluated the criteria were 12 superintendents, 12 business officers, and 26 other persons representing seven different areas in education and related organizations. Questionnaires about district practices were returned by 171 of the 240 business managers contacted.



SUGGESTED CRITERIA	Business Managers		District Superintendents		Total Jury		District Practices	
	% Yes	% No	% Yes	% No	% Yes	% No	% Yes	% No
1. Is it good practice to use district funds to pay the membership dues for individual board members in local, state and regional school board associations?.....	33	67	80	20	49	51	4	96
2. Is it good practice to use district funds to pay the membership dues of individual board members in service clubs or other civic organizations?.....	0	100	0	100	0	100	0	100
3. Is it good practice for district funds to be used to pay the membership dues of the board of education to join the county, state and regional school board associations?.....	100	0	100	0	100	0	80	20
4. Is it good practice for district funds to be used to pay membership dues for the school district in the chamber of commerce?.....	0	100	36	64	23	77	3	97
5. Is it good practice to use public funds to pay the dues of school employees in local service clubs?.....	11	89	9	91	9	91	0	100
6. Is it good practice to use public funds to pay membership dues for personnel in local, state and national teachers organizations?.....	0	100	18	82	5	95	3	97
7. Is it good practice to use district funds to pay the dues of administrators in local, state and national organizations of administrators?.....	22	78	36	64	21	79	36	64
8. Is it good practice to use public funds to pay individual membership dues for certain head administrators and not for others in professional organizations? Many districts only pay dues for the superintendent and the business manager.....	33	67	36	64	19	81	30	70
9. Is it good practice for the district to have written rules and regulations pertaining to the use of funds in regard to the payment (or non-payment) of membership dues for professional organizations, civic organizations and service clubs?.....	100	0	82	18	93	7	3	97
10. Is it good practice for such expenditures as the payment (or nonpayment) of membership dues for professional organizations, civic organizations, and service clubs from public funds to be made legal or illegal by action of the state legislature so that districts may specifically know their legal status?.....	62	38	91	9	60	40	36 4	64 <sup>1</sup> 96 <sup>2</sup>
11. Is it good practice to use district funds to pay the membership dues, in the name of the district or of a certain school, in professional organizations in order to receive the publications and research services of such organizations?.....	100	0	90	10	90	10	69	31
12. Is it good practice to use district funds to purchase the various yearbooks, magazines and research services of professional organizations (not necessarily hold individual or district membership)?.....	100	0	100	0	98	2	69	31
13. Is it good practice to use district funds for paying membership dues of service clubs or civic organizations in the name of the district and allowing the superintendent (or other administrator) to be the official representative?.....	11	89	30	70	18	82	2	98

<sup>1</sup>School board association dues.

<sup>2</sup>District and employees dues.

trict is considered legal in 45 of the states.

9. Three states consider it illegal to pay any type of membership dues.

Although there were no court cases dealing with payment of school personnel dues from district funds, two court decisions dealing with school board associations and with district dues favored the payment of such dues from public funds.

#### School District Practices

1. Five of the 171 districts have written board policies dealing with membership dues.

2. The business officials from 62 (36 per cent) of the 171 districts listed the payment of individual dues for employees in professional organizations. Of the 151 individuals listed as having dues paid, 73 per cent were superintendents and business managers.

3. One hundred twenty-eight (80 per cent) of the districts pay dues for the board of education in state school board associations.

4. Districts in three states pay for the research services of the state school board associations in lieu of

membership fees because the payment of dues is considered an illegal expenditure.

5. One hundred eighteen (69 per cent) of the districts purchase yearbooks and publications in lieu of membership fees or as periodical references.

6. Sixty-seven (39 per cent) of the districts reported the payment of "district" membership dues.

7. Fourteen districts in 12 states are paying dues in the chamber of commerce, but no dues are being paid from district funds to service clubs.

8. Fifteen districts did not indicate the payment of any dues or the purchase of any yearbooks or research services from organizations.

9. Seventeen districts pay no dues but purchase professional publications from professional organizations.

Practices in many districts do not agree with the legal authority as stated by the state superintendents in these states. This is true in those states where no statutes or legal opinions dealing with membership dues exist.

#### Fifty Specialists Judge Criteria

Criteria listed in the accompanying table (p. 95) were developed on the

basis of current practice and literature relating to the payment of membership dues.

The jury that evaluated the criteria was composed of: 12 superintendents of schools, 12 school business officers, four state school board presidents, one national school board official, eight professors of education, the executive secretaries of six state teachers associations, one state P.T.A. president, one taxpayers association official, three executive secretaries of school administrators associations, a director of the National Association of Manufacturers, and a state chamber of commerce president.

A summary of the jury members' responses follows:

1. Ninety per cent or more of the group approved these criteria: (a) dues for the entire board of education should be paid to school board associations; (b) the district should have written rules and regulations dealing with membership dues; (c) membership dues should be paid in the name of the district to obtain research services of professional organizations; (d) district funds should be used to purchase publications of professional organizations but not necessarily to obtain membership in them.

2. The following criteria were judged by 75 per cent or more of the jury as poor practice: (a) to pay membership dues for school district employees in local service clubs and teachers organizations; (b) to pay dues for administrators in their professional organizations, or to pay such dues for some administrators and not for others; (c) to pay dues for the district in civic and service organizations and allow an employee to be the official representative of the school district at the organizations' meetings.

3. The jury judgment was more evenly divided on the following two criteria: (a) 49 per cent were in favor of the payment of membership dues for individual board members in school board associations; (b) 60 per cent were in favor of a school district's having the authority to pay membership dues.

#### Recommendations

On the basis of this study, I offer the following recommendations:

1. Expenditures from district funds for the payment of membership dues in professional organizations, civic organizations, and service clubs should be made legal or illegal by action of



**Dudley LOCKS**  
your biggest  
values in  
locker protection

**RD-2**  
Rotating dial combination padlock. Rust-proof, stainless steel case, dependable 3-tumbler mechanism.

**Master-Keyed P-570**  
The finest of all Master-Keyed combination padlocks. Unique Dudley Master Key provides extra security.

More Dudley Locks are used on school lockers than any other make . . . and there's good reason for such popularity.

Rugged, dependable Dudley padlocks and built-in locks have proved their value. For more than 30 years, Dudley Locks have set the standard of school locker protection.

That's why you know you're getting top quality locker protection when you specify time-tested Dudley Locks for your school.

Every Dudley Lock carries a 2-year warranty. Write for Catalog Folder.

**DUDLEY Lock Corporation**  
Dept. 1010, Crystal Lake, Illinois

THE MARK OF QUALITY

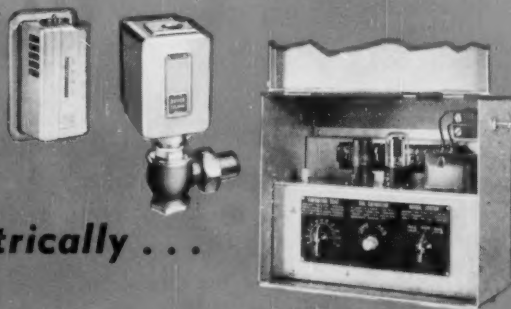


**Get ideal "indoor weather"  
that's guaranteed!**

**ELECTRIC-ELECTRONIC**

## Automatic Controls

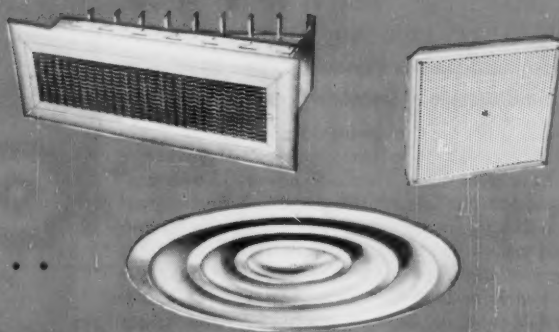
**for better control . . . electrically . . .**



**uniflo ENGINEERED**

## Air Distribution

**to make air behave . . .**



**combined skills and undivided  
responsibility for maximum comfort!**

Consult your architect or engineer — find out how he combines skills with Barber-Colman engineers (who have background in *both* air distribution and electric-electronic temperature control) to bring you the most advanced indoor comfort known today. You get this satisfying "indoor weather" from one source with *undivided responsibility* for a *guaranteed* result in any type of building. Phone your nearby Barber-Colman Field Office or write today!

### **Get help on your problem!**

If you are confronted with a heating, ventilating, or cooling problem—in new or existing buildings—call in your nearby Barber-Colman representative (offices in all principal cities) for expert counsel.

**Come to ONE source . . .  
come to . . .**

**Barber-Colman Company**

DEPT. J, 1653 ROCK ST., ROCKFORD, ILLINOIS, U. S. A.

# Said the Old Coal Stove to the "Partnership" Desk,



The **DURA-DECOR** "family of fabrics" of coated **FIBERGLAS\*** are *up-to-date fabrics* . . . designed for today's schools • Permanent Fire-Resistance • No Maintenance • Durability • Lasting Beauty

Everyone goes for the many advantages of Dura-Decor fabrics for school installations . . . from stage curtains to gym floor protection covers . . . over old-fashioned materials. Administrators and school boards like the reasonable first cost — the lasting ruggedness — of modern Dura-Decor. Maintenance men like the time it saves . . . no upkeep — ever. Teachers like the correct opacity of Dura-Decor A-V curtains. And naturally everyone values Dura-Decor's permanent fire-resistance — the result of tough Fiberglas cloth coated with synthetic resins that won't crack, peel or break . . . can't fade, mildew or rot . . . doesn't absorb dirt — no cleaning problems . . . refuses to shrink or stretch . . . Experience proves again and again that the Dura-Decor "family of fabrics" — available in a wide choice of colors, weights and finishes — is the sensible, thrifty choice for your own school . . . now and in the years to come.

\* T.M. Reg.

For your personal copy of the new descriptive and illustrated catalog containing actual samples of the DURA-DECOR "family of fabrics" . . . and for the name and address of the Major Decorating Studio in your vicinity qualified to fabricate and install Dura-Decor fabrics, write Dept. 362



**DURACOTE CORPORATION**  
RAVENNA . . . OHIO

DURA-DECOR Fabrics are used for Stage Curtains • Cycloramas • Window Drapes • Curtains for Wardrobe Openings • Protection Curtains • Room Dividers • A-V Room-Darkening Curtains • Reversible Cycloramas • Gym Floor Protection Covers

the state legislature or by a ruling of the attorney general so that school boards may know the legal status of these expenditures.

2. Each local board of education should have written rules and regulations pertaining to the use of funds for membership dues in these different types of organizations.

3. Payment of dues for the entire board of education in the county, state or regional school board association should be made a legal expenditure by action of the state legislatures.

4. Membership dues in service clubs and civic organizations for employees, the school district, or the board of education should not be paid from public funds.

5. Individual membership dues of employees in professional or civic and service organizations should not be paid from public funds.

6. Payment of membership dues for the district or school board in those professional organizations having for their exclusive purpose the promotion and advancement of public education should be a legal expenditure.

7. A thorough investigation of convention and conference expenses should be made, especially in the "twilight" legal area of payment of membership dues in professional organizations as part of the registration fees at conventions.

8. The associations of school officials on both state and national levels should sponsor legislation to implement some of the recommendations of the study.

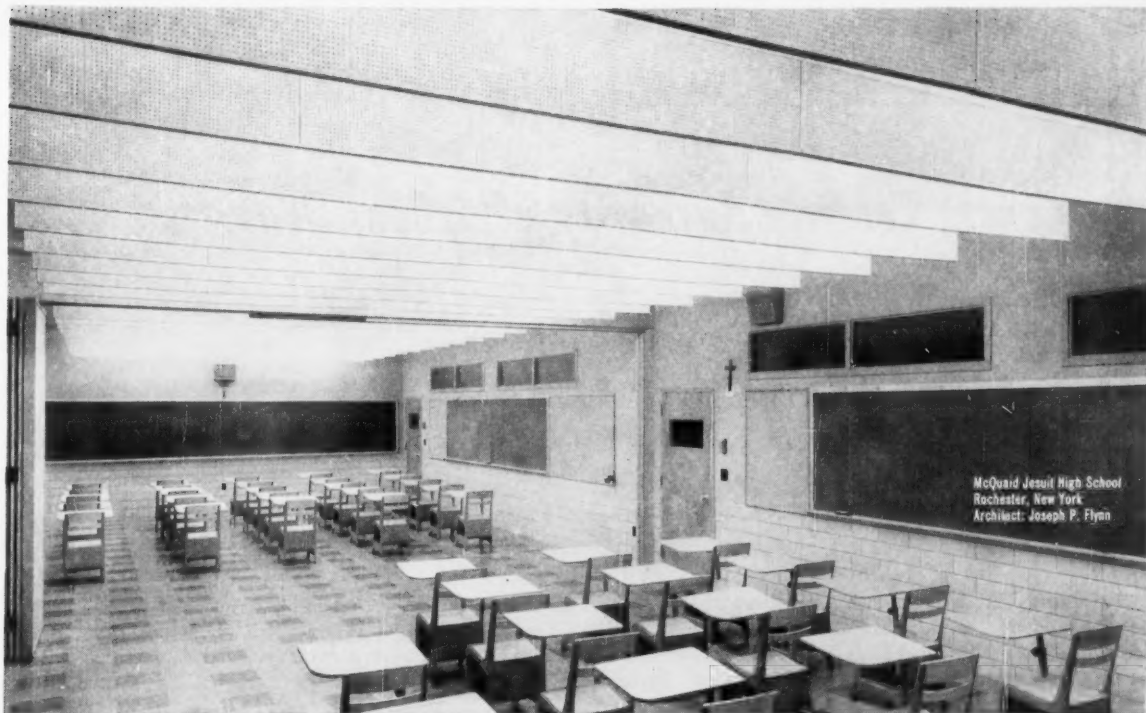
Two extremes may exist in an individual state where some local boards may be able to abuse the authority to use public funds for membership dues, whereas at the other extreme no public funds may be used to support even the organizations that do contribute to education. These professional organizations are playing an increasingly significant rôle in business life.

As society becomes more complex in nature, the need for people to work with and belong to groups or organizations becomes more desirable and necessary to the individual. Society is becoming such that people are working more as members of cooperative groups rather than as individuals.



Such a group may work collectively for the well-being of society in general in the search for new and better ways of doing things, or a group may work as a collective body to better the welfare of its individual members. #







# ASSURED EYE-COMFORT® makes a better classroom

Eye-Comfort® is assured where there's an abundance of quality illumination, properly controlled and free from glare. Curtis Light and Sound Conditioning Systems®, like that shown, combine Assured Eye-Comfort® illumination with a medium to control excessive noise, eliminating two causes of student malfunctioning—improper lighting and inadequate sound control. So make your classrooms a better place to learn with a Curtis Eye-Comfort® Light and Sound Conditioning System®. Send the coupon for information on this and all Curtis Assured Eye-Comfort® School Lighting Systems.  

**CURTIS LIGHTING, INC.**  
6135 W. 65th St., Chicago 38, Illinois



in Los Angeles: 242 S.  
Anderson St., Los  
Angeles 33, California  
in Canada: 195 Wick-  
stead Ave., Toronto  
17, Canada

CURTIS LIGHTING, INC., Dept. O-11, 6135 W. 65th St., Chicago 38, Illinois  
Please send information on Curtis Assured Eye-Comfort® School Lighting  
Systems to

Name \_\_\_\_\_  
Company \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_ State \_\_\_\_\_

## THE SCHOOL LUNCH

Conducted by  
Mary deGarmo Bryan

# Courts Confirm Authority of School Districts to Operate Lunchrooms

**Cafeteria considered an extension of the curriculum  
and a welfare service for the pupil**

LEE O. GARBER, *Professor of Education, University of Pennsylvania*

THE school lunch program has become commonplace, and little thought is generally given to its legal status. Nevertheless, this aspect of the school's program has, on several occasions, been the source of litigation. Surprisingly enough, however, when one considers the annual expenditures for lunchrooms and the total number of persons they serve, comparatively few cases have been brought in the courts. Those that have, though, have resulted in significant decisions which have implications for administrative practices.

**Authority of School Districts to Operate Lunchrooms.** With school lunchrooms or cafeterias so common today, it is difficult to imagine that, not many years ago, the authority of school districts to maintain and operate them was being questioned in the courts.<sup>1</sup> Almost without exception the courts have agreed that, in the absence of statute permitting them to do so, school boards have the implied power to maintain and operate nonprofit lunchrooms as the means of promoting the public welfare, *i.e.* for the benefit of pupils.

In an early Texas case (1916), however, the court appears to have held differently.<sup>2</sup> In this case, the authority of a board to operate lunchrooms was not directly before the court. The

question was whether a board had the authority to make a rule forbidding students to leave the school's premises at noon and to eat lunch at a neighboring lunchroom.

The owner brought an action against the district, contending that the board's rule amounted to a boycott of his business under the statute and that it resulted in considerable monetary loss to him. The court appeared to accept this contention and, in holding that the trustees were not permitted to proceed in the manner alleged to be in violation of the statute, commented to the effect that the board's action was "for a purpose not properly pertaining to the interests of the pupils, or the cause of education, or to preservation of school property." How it would have held had the question before it been the authority of the board to operate a cafeteria, rather than enact the rule it did, cannot be predicted. It is also significant that it is not clear whether this particular cafeteria made a profit or not. If so, this might have influenced the court's thinking.

On the other hand, another Texas court, at a later date, made it clear that school lunchrooms serve a public function and are not in commercial competition with private restaurants, merchants and lunchrooms.<sup>3</sup> In this case some profit was made, and it went into a student fund used to purchase athletic equipment, library books, and material for the music department.

In commenting on the function of the lunchroom, the court said: "It is apparent from the record that the establishment and maintenance of the

cafeteria by the school board does not subserve a private mercantile purpose in any commercial competition with private restaurants, but is conducted for the student body . . . for reasons which concern their welfare as students. . . . The cafeteria is a necessary convenience, and is not obnoxious to any constitutional or statutory inhibitions, and we think, a reasonable exercise of the discretionary power conferred by law upon the board."

In a federal case, which also had its origin in Texas, the same point of view, that a school district in operating lunchrooms was not engaged in competing with private industry, was expressed. Here the court held that operating a lunchroom was a governmental function and the fact that the cafeteria funds were kept separate from school funds was of no importance. The court's language, in commenting on school cafeterias, is significant. It said: ". . . the cafeteria system is considered by prominent educators to be an extension of the educational curriculum to include instruction in dietetics, social customs, and health and hygiene."<sup>4</sup>

Likewise, another federal court, in ruling on the authority of the Denver school board to operate cafeterias, held that this power was implied in a Colorado statute that provided that school boards "shall have control of instruction in the public schools of their respective districts."<sup>5</sup>

<sup>1</sup>Goodman v. School District No. 1, 32 F. (2d) 586 (1929); Hoskins v. Commissioner of Internal Revenue, 84 F. (2d) 627 (1936); Bozeman v. Morrow, 34 S.W. (2d) 654 (Tex.) (1931).

<sup>2</sup>Hailey v. Brooks, 191 S.W. 781 (Tex.) (1916).

<sup>3</sup>Bozeman v. Morrow, 34 S.W. (2d) 654 (Tex.) (1931).

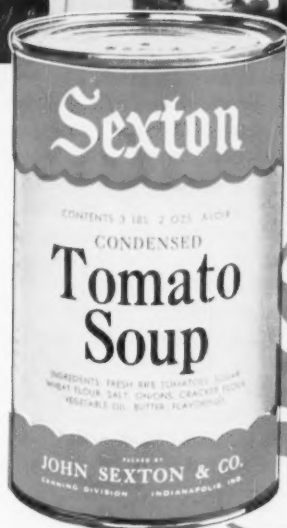
<sup>4</sup>Hoskins v. Commissioner of Internal Revenue, 84 F. (2d) 627.

<sup>5</sup>Goodman v. School District No. 1, 32 F. (2d) 586 (1929).

# Memorable taste appeal

When served soup in a public eating place, guests expect more than they can buy at a store—an expectation amply fulfilled in any of the complete assortment of Sexton soups. They are different, more delicious, with a full body and full flavor reminiscent of the home kitchen in Grandmother's time. Prepared solely for your service and with your needs in mind, they are sure to satisfy.

*Chalet Swiss Restaurant  
Puerto Rico*



# Sexton

*Quality Foods*

JOHN SEXTON & CO., CHICAGO, 1956



## Who Does the Job— How Long Does it Take

In this day of teacher shortage and restricted budgets, non curricular jobs should be done the fastest, least expensive way. Does handling lunchroom receipts delay getting your afternoon classes started on time? More and more schools are doing the job by electric machine. The KLOPP counts 2700 coins per minute with positive accuracy—inserts them in wrappers for bank deposit.



### KLOPP COIN COUNTER

Electric  
and  
manual  
models.

Also  
Sorters

### KLOPP ENGINEERING, INC.

35551 Schoolcraft Road  
Livonia, Michigan

Please send catalog and prices on  
Klopp Counters & Klopp Sorters.

School .....

City ..... State .....

Per .....

**Liability of School District for Injuries Received by Employees of Lunchrooms.** In connection with the question of the operation of lunchrooms, another question has been raised in at least a single instance—that of the liability of a district to one injured while performing his duties as an employe of the cafeteria. In St. Louis, where the school board operated a lunchroom in a high school, an employe was injured while cleaning a food-chopping machine. As a result, she brought an action against the school district for damages. In her suit she recognized that the school district was not liable for injuries growing out of a governmental function but argued that the operation of the lunchroom was not such a function. It was her contention that the school board, in this case, was engaged in the performance of a proprietary or self-imposed duty rather than one of a governmental nature, and so was not immune from liability.

The court did not accept this contention. It held that the district was engaged in the performance of a governmental duty when it operated the lunchroom and so refused to hold it liable in damages, thus following the common law rule of nonliability.<sup>6</sup>

**Controlling School Lunchrooms.** In general, it may be stated that the supervision and control of school lunchrooms is vested in the school board. In a somewhat unique and unusual decision, it has been held, in St. Louis, that the power to license and inspect school lunchrooms was vested in the health commissioner of the city.<sup>7</sup>

The question here was whether a city ordinance requiring the commissioner of health to license and inspect restaurants carried with it the implied authority to license and inspect school lunchrooms. The school board contended that it did not. It argued that the duties and powers of both the school board and the city sprang from the same source, the state, and that the board's lunchrooms were not subject to the control of the city because the legislature had, by statute, authorized their establishment by the school board.

<sup>6</sup>Krueger v. Board of Education of St. Louis, 274 S.W. (2d) 811, 310 Mo. 239 (1925).

<sup>7</sup>Breck v. Board of Education of City of St. Louis, 213 S.W. (2d) 889 (Mo.) (1948); upheld by Smith v. Board of Education of City of St. Louis, 221 S.W. (2d) 203 (Mo.) (1949).

The court rejected this contention and ruled that the city's police powers extended to all within the city's limits unless the statute specifically exempted other state agencies, that a general statute giving school boards the authority to establish lunchrooms did not place the lunchroom beyond the control of the city. It is believed that most courts would have ruled in favor of the board. The school district is an agent of the state, an arm of state government. It is generally held that it, like the state, is not subject to any control by the municipality. Therefore, when a conflict in authority between the district and the municipality arises, most courts are likely to hold that, in the absence of a statute specifically authorizing the municipality to do so, it cannot interfere with an activity of the district.

**Purchase of Supplies.** In the purchase of supplies for its lunchroom the school board is bound to comply with all necessary statutes. Only one case, apparently, has been brought involving this aspect of the problem.<sup>8</sup> Even in this case it is not quite clear whether the question involved the purchase of supplies for the home economics department or for the lunchroom, or for both. Nevertheless, the court's decision is applicable. Here, one member of the board who was interested in a wholesale grocery establishment made arrangements for the district to purchase supplies from his company at a considerable savings in cost to the district. In an action for an injunction to prevent further dealings between the board and this board member, there was no allegation that unfair advantage had been taken of the board. Instead, it was contended that the board could not legally contract with one of its own members, and the oath taken by the board member to the effect that he would not be a party to a transaction with the board was cited. The court enjoined him from having further dealings with the board but refused to order the return of the money paid to him by the board under the contract.

In commenting on the case, the court said: "He was interested in a wholesale grocer company, and such company sold the school district supplies at wholesale cost. It was established, without contradiction, not only that the district received every item

<sup>8</sup>Dowell v. School District No. 1, 250 S.W. (2d) 127 (Ark.) (1952).





## Hobart Delivers Higher Standards, Lower Cost per Serving— in Kitchen-Wide Installations

It's always a great advantage to plan your choice of equipment with Hobart—to consolidate your purchasing and servicing. It saves time and trouble, gives better results, and delivers both individual and overall economies (as in interchangeability features). Many Hobart products, such as food cutters and mixers, can be used to great advantage in more than one "quarter".

You get the widest coverage of products in the industry, including food waste disposers and food, kitchen, bakery and dishwashing machines. (Full line only partially illustrated.) You get the most models, for greatest individual efficiency in size and capacity. And they're **Hobart** machines, backed by an unparalleled engineering reputation, a guarantee and service facilities known and respected everywhere . . . **The Hobart Manufacturing Company, Troy, Ohio.**

Trademark of Quality



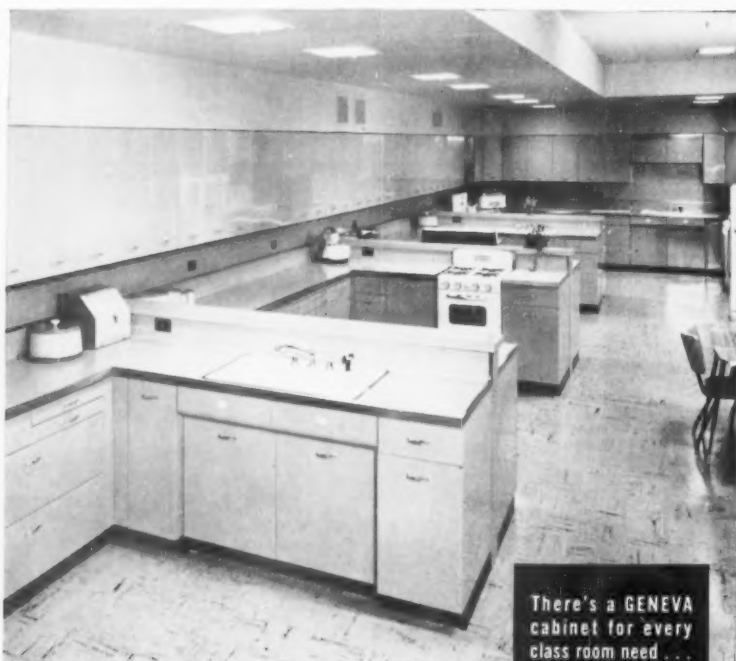
for over 55 years

# Hobart machines

The World's Largest Manufacturer of Food,  
Kitchen and Dishwashing Machines

# GENEVA CABINETS

**OFFER MORE - FOR  
HOME ARTS CLASS ROOMS...**



There's a GENEVA cabinet for every class room need . . .

- IRONING BOARD
  - WARDROBE
  - FOOD STAPLES
  - TOTE TRAY
- to mention a few.

*Beauty...Versatility*

**PLUS LOWER MAINTENANCE**

Your school benefits two ways when you specify GENEVA steel cabinets . . . lower initial cost . . . decidedly lower maintenance cost. And GENEVA offers the most extensive line of steel cabinets in the industry, designed specifically to meet the requirements of home arts departments. If your school is anticipating remodeling or new building, investigate the economy and fine quality of GENEVA cabinets.



**CABINETS OF STEEL  
FOR LASTING APPEAL**



## GENEVA MODERN KITCHENS

Division of Acme Steel Co.  
Geneva, Illinois, Dept. NS-10-56

Please send illustrated brochure of GENEVA steel cabinets designed for home arts class rooms.

☐ We are building ☐ We are remodeling

Name \_\_\_\_\_

School \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_

for which it paid the wholesale grocer company, but also that the district saved hundreds of dollars through Milburn's willingness to have his wholesale grocer company forego profits in dealing with the school district."

**Making Rules Requiring Students to Use Lunchroom Facilities.** While it seems clear that a school board has no authority to enforce a rule requiring all students to patronize its lunchrooms, it is equally clear that a school board does have the authority to make and enforce a rule requiring all pupils to remain on the school grounds during the noon hour, if it provides adequate lunch facilities for the children, or to make and enforce a rule prohibiting pupils from purchasing lunch at a near-by restaurant and requiring them to eat either in the lunchroom or from lunches brought from home.<sup>9</sup> The single exception to this rule appears to be the early Texas case (1916), *Hailey v. Brooks*, which was commented on earlier.

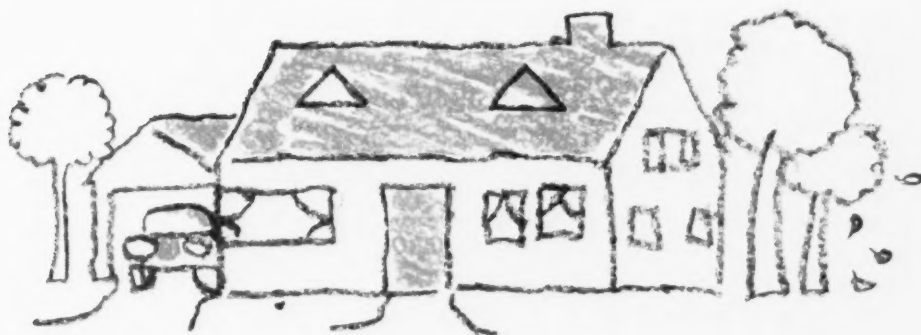
In the most recent, and one of the most interesting, of these cases,<sup>10</sup> a parent brought an action against a school board challenging the legality of a rule promulgated by the principal which provided: "No one, while in school, shall be allowed to enter the restaurant of Mr. Russell or any other business establishment in the town without permission from 8:15 a.m. until 3 p.m."

The lower court held the rule arbitrary and void, but the court of appeals reversed it. Here the school maintained a lunchroom where children could purchase their lunches for 20 cents. No charge was made in the case of indigents. Pupils living near school were permitted to go home for lunch if their parents requested it.

A Mr. Russell operated a cafe adjacent to the school property and was set up to serve children without their leaving the school grounds. A Mr. Luster, a citizen and taxpayer, had two children in school. He persisted in meeting them at noon and taking them to Mr. Russell's cafe or in permitting them to go there for lunch. On Sept. 14, 1953, the principal notified him that because he was "continuing to

<sup>9</sup>Casey County Board of Education v. Luster, 282 S.W. (2d) 333 (Ky.) (1955); Bishop v. Independent School District, 29 S.W. (2d) 312, 119 Tex. 403 (1930); Flory v. Smith, 134 S.E. 360, 145 Va. 164 (1926).

<sup>10</sup>Casey County Board of Education v. Luster, 282 S.W. (2d) 333 (Ky.) (1955).



*No matter how large or small their homes...*  
**this subject is a necessity**  
**to your students!**

The size of the home or the circumstances of the average family no longer have much bearing on the use of a food freezer. You find this appliance in all types of homes, because it has become a *vital factor* in modern meal preparation.

That's why your students need instruction on the packaging, freezing and storing of foods. The modern home freezer now makes it possible for the efficient homemaker to feed her family well with less work, in less time and at lower cost than without it. That's why food freezing is a necessity in your home economics curriculum.

**You need freezers to teach food freezing!** Unless your home economics department is equipped with food freezers for teaching purposes, your teachers are handicapped. They can't give practical demonstrations in classes.

This appliance is easily installed, needs no special wiring—just plugs in. The purchase cost is moderate, and your local electric light and power company or electric appliance dealer can give you all the facts.



#### HOUSEHOLD REFRIGERATOR AND FREEZER SECTION

National Electrical Manufacturers Association • 155 East 44th Street, New York 17, N. Y.

ADMIRAL • CROSLEY • FRIGIDAIRE • GENERAL ELECTRIC • HOTPOINT • KELVINATOR • NORGE • PHILCO • QUICFREZ • RCA WHIRLPOOL • WESTINGHOUSE

#### *If your school does not have the* **FREEZER TEACHING KIT...**

This Kit provides visual aid for home economics teachers, to simplify freezer instruction in the classroom. It consists of 12 beautiful, full-color wall charts and the Home Freezer Teaching Guide. Be sure each of your schools has a Kit. Send for it yourself and present it to the home economics teacher.

HOUSEHOLD REFRIGERATOR AND  
 FREEZER SECTION  
 National Electrical Manufacturers Association  
 155 East 44th Street, Dept. NS-10-56  
 New York 17, N. Y.

Please send me, absolutely FREE, the NEMA  
 Freezer Teaching Kit.

Your name and title.....

Name of school.....

Address.....

City.....Zone.....State.....

# Sheldon



Total Experience  
Science Table

**Your School Dollars  
Go Further with**

# Sheldon

**Educationally Correct  
FURNITURE**

The cost of school equipment can only be measured by the service it renders.

The Sheldon Total Experience Science Table is a case in point. This table is designed and equipped to do the work of several units — and do it better. It provides complete facilities for learning experiences in a given science, and stimulates interest in exploring related sciences. It need never be idle during the school day.

For efficiency, utility, and curricular flexibility, your most economical buy in science furniture is Sheldon.

# Sheldon

**EDUCATIONALLY CORRECT  
FURNITURE FOR  
SCIENCE • HOMEMAKING  
INDUSTRIAL ARTS •  
MUSIC • ART**

**E. H. SHELDON EQUIPMENT CO.  
MUSKEGON, MICH.**

force his children to disobey the school regulation" the board, the principal, and the superintendent were suspending them from school but would permit them to return when he saw to it that they complied with the school's regulation. Mr. Luster then brought this action to have them reinstated. He contended the rule was arbitrary and unreasonable. It should be noted here that it was "not denied the rule was put in effect to prevent these children from buying food at this cafe and to encourage those who purchased their lunches to do so at the school lunchroom."

The court, in arriving at its decision, first considered two statutes which required children to abide by the legal regulations for the government of schools and which gave to teachers the authority to hold pupils to account for their conduct "in school, on the way to and from school, on the playgrounds, and during intermission or recess." It pointed out that those in charge of schools had the authority to make all necessary rules and that they were in a better position to judge the wisdom of such rules than was the court; the court's only concern was whether they were reasonable or arbitrary.

In commenting on the rule in question, it said: "It is common knowledge that children, if allowed to depend upon their own selection, often indulge themselves in unbalanced diets. Furthermore, if uncontrolled at table young children are apt to engage in rough or uncouth practices and conduct. If the school lunch is to be successful, then all children who purchase their noon meal may be required to do so from the school lunchroom. The regulation appears to be for the common good of all children attending this school and we find that it is not unreasonable or arbitrary. This case is quite like *Flory v. Smith*, . . . where the Virginia Supreme Court of Appeals upheld a school regulation which prevented a father of two children from daily taking them to lunch with him at a hotel."

While it was not before the court, one question remains to be answered. Are school officers liable if they pass a rule denying to pupils the right to patronize certain business establishments located near the school?

In an Indiana case pupils were requested not to patronize a shop across the street from the school.<sup>11</sup> An action

was brought by the proprietor against the board, the superintendent, and a teacher to recover damages for the resulting loss of business, on the theory that the pupils were maliciously persuaded not to trade at the store. The court, in denying recovery, held the proper authorities were justified in making such rules and regulations as were necessary for the discipline and management of the school and that "it was not an unlawful act to advise or persuade the pupils not to visit appellant's store."

To the same effect is a Michigan case in which a court held the board was justified in enacting a somewhat similar rule which, for the purpose of controlling the conduct of pupils while engaged in going to and from school, forbade their entering and loitering in places of business.<sup>12</sup>

**Conclusions.** From the cases cited, the following legal conclusions relating to the maintenance and operation of lunchrooms seem warranted:

1. A school board has the implied authority to operate nonprofit lunchrooms in its schools as a means of promoting the common good of all pupils.

2. In the operation of its lunchrooms a school board is engaged in a governmental and not a proprietary or self-imposed function.

3. Because the operation of a lunchroom is a governmental duty, a school district, located in a state where the common law rule of immunity holds sway, is not liable for injuries received by employees.

4. Most courts, it is believed, would agree that the control and supervision of lunchrooms are vested in the hands of the board exclusively, in spite of the fact that in Missouri it has been held that, where the statute authorizing school boards to establish lunchrooms did not specifically exempt them from the control of municipal authorities, the municipality had the authority to inspect and license them.

5. A school board may not contract with one of its members for the purchase of supplies for its lunchrooms.

6. A rule requiring all pupils either to bring their lunches from home or to purchase them in the school lunchroom, and forbidding them to patronize neighborhood cafes, is neither unreasonable nor arbitrary, and a tradesman whose business suffers as a result has no right to complain. #

<sup>11</sup>*Guethler v. Altman*, 60 N.E. 355, 26 Ind. App. 587 (1901).

<sup>12</sup>*Jones v. Cody*, 92 N.W. 495, 132 Mich. 13 (1902).



# 4 Firsts



*First Award*  
FOR SUPERLATIVE ACHIEVEMENT  
IN FOOD SERVICE AND SANITATION

Harold Housman, Mott Hotel, New York

City of Directors & Trustees

Program: William H. Housman

Fabricator: Housman Brothers Co., New York City

Installer: Housman Brothers Co., New York City

TENTH ANNUAL  
FOOD SERVICE CONTEST

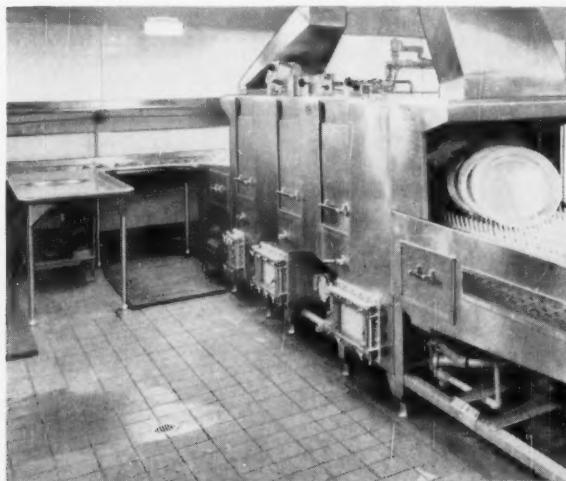
*Institutions* MAGAZINE

# out of 6!

Greater efficiency...is a principal  
objective of the Annual Food  
Service Contest conducted by  
INSTITUTIONS magazine.

# BLAKESLEE EQUIPPED KITCHENS

How much time does it save? How much labor is eliminated?  
How good a job does it do? How soon will it pay for itself?  
These are important questions astute buyers want answered  
when investing in new equipment.  
Follow the experienced lead of these winners...



- ★ **The Beverly Hilton**, Beverly Hills, Cal.  
Served by 7 Blakeslee Dishwashing machines.  
Architect and Engineer: Welton Becket F.I.A.I. and Assoc.  
Installer: Harold E. Peterson, Inc. and West Coast Fixture Co., Inc.
- ★ **The Houston Club**, Houston, Texas  
2 Blakeslee 86 PT Dishwashing Machines  
Designers: Henry O. Barbour; Alvin W. Anderson  
Fabricator and Installer: S. Blickman, Inc.
- ★ **Umprey Lee Student Center**  
Southern Methodist U., Dallas, Texas  
Blakeslee 86PT3 Dishwashing Machine  
Designers: George Pierce A.I.A., Abel B. Pierce A.I.A.  
Fabricators and Installers: Gardner Hotel Supply Co.
- ★ **Town and Country Restaurant**, Chicago, Ill.  
Blakeslee 85PT3 Dishwashing Machine  
Designer: Fred Schmid Associates  
Installer: Store Equipment Co.  
Fabricator: Alex Janows Co.

FOR THE  
**BEST BUY**  
**BLAKESLEE**

DISHWASHERS  
GLASS WASHERS  
PEELERS-MIXERS  
AND ACCESSORIES

Write for information on complete line

**G. S. BLAKESLEE & CO.**

1844 SO. LARAMIE AVE., CHICAGO 50, ILL.  
NEW YORK LOS ANGELES TORONTO



## A fresh air seat for *no sleepy corners . . .*

### TRANE

*Unit Ventilator with  
Kinetic Barrier Action  
ventilates every corner . . .  
every minute of the day*

**Students need** fresh, wholesome air to stay alert, attentive. Not just by the window, not just on warm days—but in every corner of the classroom, all day long, every month of the year! Ordinary heating-ventilating systems leave sleepy corners and stale air spots . . . with some seats cold and drafty, while others are hot and stuffy.

TRANE Unit Ventilators blend and distribute fresh, filtered air gently—evenly—to every corner of the room, *every minute of the day*, every season of the year. Every pupil in the room has a fresh air seat—all

day long! That's because *only* TRANE Unit Ventilators have exclusive *Kinetic Barrier Action* that give you *powered ventilation* across the entire length of outside wall or window. And with TRANE Unit Ventilators, wasteful overheating is virtually eliminated. Students have an ideal climate for learning—at the lowest possible heating cost!

Ask your architect, contractor or consulting engineer about TRANE Unit Ventilators for your school. Have him contact his nearby TRANE Sales Office—or write TRANE, La Crosse, Wis.



**How Kinetic Barrier Action** works: Air—warm or cool, as called for by the room thermostat—is delivered under pressure from *wall to wall extensions*. As it reaches the ceiling, it picks up room air . . . creates a gentle, circling flow of uniform ventilation across the entire room. And the room warms up *fast* . . . instant response to thermostat stops wasteful overheating, provides fast morning warm-up. Never a hot spot, cold spot, stale air pocket anywhere—any time! A fresh air seat for every pupil in the room!

**TRANE stops drafts** before they start! This smoke test shows how TRANE Unit Ventilators are solving the window downdraft problem with *positive* protection. Chilled air from icy window panes is blocked by an upward rising column of tempered air across the entire window. Unlike systems that depend upon wall-length heating elements, the TRANE *Kinetic Barrier Action* stops window drafts *full-time*—even when the thermostat has shut off room heat. There's an ideal climate for learning—all day long!



**every pupil in the room...**  
*no stale air spots . . . no drafts!*



In the gym, locker room or auditorium, TRANE Volume Ventilators ventilate and heat. For entryways, Force-Flo Heaters stop cold drafts. Heat large open areas with TRANE Unit Heaters.

For halls, stairways, windows, use TRANE Connectors. In shops, pools, TRANE Wall-Fin heats on a budget. For offices, UniTrane units heat, cool, ventilate. TRANE Steam Specialties save fuel.

*For heating, cooling, ventilating . . .  
For any air condition, turn to*

**TRANE**

**MANUFACTURING ENGINEERS**

THE TRANE COMPANY, LA CROSSE, WIS. • EASTERN MFG. DIV., SCHANTON, PA.  
TRANE COMPANY OF CANADA, LTD., TORONTO • 80 U.S. AND 19 CANADIAN OFFICES





## wire from **Washington**

By EDGAR FULLER

### **New commissioner**

► Secretary Marion B. Folsom and Undersecretary Herold C. Hunt of the H.E.W. Department are making an impressive and diligent search for a new U.S. commissioner of education, but an acceptable administrator willing to take the position is proving difficult to find.

The 84th Congress increased the commissioner's salary from \$14,800 to \$16,000, which is still less than the present salaries of most of the men being considered. The salary factor eliminates some prospects, but there are other difficulties. A number of leading educational executives, for instance, have said they might be interested after the November election, but they are now unwilling to face the uncertainty of tenure after January 20.

Before 1953 there was a considerable period of stability in the commissionership, with John W. Studebaker serving from Oct. 23, 1934, to July 15, 1948. Veteran Deputy Commissioner Rall I. Grigsby was then acting commissioner until March 16, 1949, after which Earl James McGrath held the office until April 22, 1953.

Since Inauguration Day in 1953, the commissionership has been vacant for 143 days up to Sept. 1, 1956, and the new commissioner will be the fourth. Following Dr. McGrath's resignation, Lee M. Thurston served only from July 2 to Sept. 4, 1953, before his untimely death; Samuel M. Brownell's term has been from Nov. 16, 1953, through Aug. 31, 1956.

### **Acting commissioner**

► Deputy Commissioner John Ralph Rackley will be acting commissioner until a new appointee takes office—or until November 1—whichever comes first. Dr. Rackley has been on leave of absence from the University of Oklahoma since late in September 1955 to serve as deputy commissioner. He has accepted a position as dean of the school of education of Pennsylvania State University beginning not later than November 1.

With the departure of Commissioner Brownell and the return of Homer D. Babbidge to Yale on September 1, Dr. Rackley fell heir to the responsibilities of acting commissioner, deputy commissioner, and assistant commissioner for research, and was also left without an assistant to the commissioner.

### **Enrollments grow**

► Enrollments in public and private elementary and secondary schools and colleges for the current school year are estimated at 41,553,000 by the Office of Education. This is an increase of 1,754,300 over last year, with 1,103,800 of these in elementary schools, 364,500 in high schools, and 236,000 in colleges and universities.

### **Need for school facilities**

► Advance estimates from state departments of education predicted construction of 67,000 public school classrooms last year. The accuracy of these estimates will not be known until later this fall, but they are believed to be somewhat in excess of actual construction.

This year's pupil increase will fill a large majority of the new classrooms, but there will be some left to cover increased requirements resulting from such causes as pupil migration, abandonment of unsafe and obsolete facilities, and consolidation of school districts. For several years the Office of Education's school housing section has estimated such requirements at from 18,000 to 20,000 classrooms annually, in addition to those required to care for enrollment increases.

Commissioner Brownell's most recent statement about school construction in relation to needs is as follows: "Some progress is being made in reducing the classroom shortage accumulated over a period of years. If the needs of children for classrooms are to be met in a reasonable time, however, the rate of construction should be sharply increased." Other authorities believe that, at best, public school construction barely balanced increased re-

quirements last year and that there was probably some increase in the backlog of need.

### **Scientists and engineers**

► The American Association for the Advancement of Science has recently launched three projects intended to result in closer cooperation between scientists and educators.

A Joint Commission on Science Teacher Education has been organized with the American Association of Colleges for Teacher Education. This commission is planning a major study of secondary school science teacher preparation.

An agreement has been reached to cooperate with the National Association of State Directors of Teacher Education and Certification to encourage appointment of scientists to curriculum commissions and state councils on teacher preparation in the states. Four centers are making a study on the use of science counselors, using funds from the A.A.A.S. Selected secondary schools are cooperating with the state universities of Oregon, Nebraska and Texas and with Pennsylvania State University.

A brochure describing these activities is available from Director John Mayor, A.A.A.S. Science Teaching Improvement Program, 1515 Massachusetts Avenue, N.W., Washington, D.C.

### **Platforms on education**

► *Achievements Claimed:* The Republicans point with pride to four major achievements: creation of the Health, Education and Welfare Department; increase in the vocational rehabilitation program; the White House Conference on Education; an analysis of problems of education beyond the high school.

Of these, the White House Conference served a useful purpose in alerting the public to the needs of education, and the activities of the newly created Committee on Education Beyond the High School are promising. The Administration led in





***Make yourself HEARD!***

**—without KILLING your voice.**

**N**ow you can command the attention of individuals or groups . . . up to half-a-mile away . . . without straining your voice! Audio Hailer amplifies your voice 1000 times. It is the **ONLY** electronic megaphone, with a genuine vacuum-tube amplifier. Yet it is completely self-contained, operates on dry batteries, weighs only 5½ lbs.

Used by athletic coaches, band directors, cheer leaders —for bus-dispatching, fire drills, pool and playground supervision, and as a flexible emergency P.A. system. For more details, or demonstration, just clip coupon below to your letterhead.

Audio Equipment Co., Inc.  
Great Neck, N. Y.



**AUDIO**

**HAILER®**

PORTABLE • SELF-CONTAINED  
ELECTRONIC MEGAPHONE

***Amplifies your voice 1000 times!***

**AUDIO EQUIPMENT CO., INC., Great Neck, N. Y.**

I would like ☐ brochure ☐ demonstration of Audio Hailer

NAME \_\_\_\_\_

TITLE \_\_\_\_\_

SCHOOL OR COLLEGE \_\_\_\_\_

ST. & NO. \_\_\_\_\_

CITY OR \_\_\_\_\_ ZONE \_\_\_\_\_

TOWN \_\_\_\_\_ (if any) STATE \_\_\_\_\_ N

expansion of vocational rehabilitation as early as 1953.

The inclusion of the U.S. Office of Education in the new H.E.W. Department, however, is widely regarded as a step in the wrong direction. The N.E.A., A.A.S.A., C.C.S.S.O. and other organizations have continued to favor an independent agency for education in the federal government.

The Democrats base their achievements on such actions of the Democratic 84th Congress as the voting of the maximum funds authorized by law for vocational education.

With a Democratic Congress and a Republican President, there are naturally conflicting claims. As a matter of fact, much legislation was essentially bipartisan, with its major provisions settled in closed meetings of congressional committees.

More noteworthy were the omissions in both platforms. The new Library Services Act, for instance, was not mentioned by either party.

► *Promises for the Future:* The Republican party promises to "... press all such actions that will help ensure

that every child has the educational opportunity to advance to his own greatest capacity." It also pledges to "... renew its efforts to enact a program based on sound principles of need and designed to encourage increased state and local efforts to build more classrooms." In view of the party's record of effort on school construction legislation, many educational observers are not inclined to take the latter promise very seriously.

The Republicans "demand" federal assistance to help build facilities to train more physicians and scientists. They favor further expansion of vocational rehabilitation, school milk, and school lunch programs but do not mention vocational education of less than college grade.

The Democratic platform calls for federal assistance for school construction "... within the traditional framework of state and local control" and sets as a goal "... addition of all necessary classrooms for our primary and secondary schools." It also pledges the party to provide better education for migrant children, aid for teacher education in technical and scientific fields and for teachers of exceptional children, and expansion of student, teacher and cultural exchange with other nations.

The Democrats favor expansion of school milk and school lunch programs, along with expanded vocational education and vocational rehabilitation programs, including a specific pledge of "... aid to the states and localities for area technical-vocational schools."

The Democratic platform is more generous in its educational promises than the Republican. This may be normal for a party whose members are reputed to average less wealth and more children than their Republican counterparts have.

► *School Segregation:* Both parties presented moderate planks on civil rights, an issue made of special importance to education by recent Supreme Court decisions. (See excerpts on page 48.)

The Republican position can probably be judged better from action thus far taken by President Eisenhower than from the platform itself. He has called repeatedly for leaving action to desegregate schools to the federal courts, without federal executive or legislative interference with the schools. Mr. Stevenson's position on the problem of integration appears to be the same.



## International School Seating Excels !

Yes, from any angle, International seats are your best investment ! Initial cost is lower than you'd expect for top quality. Low maintenance results from all-steel construction, hingeless seat suspension, interchangeable seats and backs. Comfort is assured... in exclusive design features.

When you think of auditorium seating, think of INTERNATIONAL. Let us send you full information about the chairs that cost far less in the long run.

# International SEAT

DIVISION OF

UNION CITY BODY CO., INC., Union City, Indiana



The Kilgore College Rangerettes and Ranger Basketball team practice on their new Seal-O-San finished cork tile gymnasium floor.



## Kilgore College Makes New Cork Tile Gym Safe, Slip-proof with Huntington's Super Seal-O-San®

Kilgore officials decided upon cork tile as the material for flooring their new gymnasium. It had resiliency and the acoustical properties they sought. Their problem was to give this "soft" floor permanence with a sealer that would retain the non-slip quality inherent in cork and keep maintenance costs low.

They selected Huntington Laboratories' Super Seal-O-San, a finish of great durability.

If you are planning a new gym floor, or refinishing an old one, use the coupon below to learn more about Seal-O-San.

### HUNTINGTON LABORATORIES

HUNTINGTON LABORATORIES, INC.  
Huntinton, Indiana • Toronto 2, Ontario

The Kilgore story interests us. Tell us more about the use of Seal-O-San on

☐ wood, ☐ cork. ☐ Please have your representative call.

NAME

TITLE

SCHOOL

ADDRESS

CITY

STATE



# What Automation Means for School Administration

Report of N.C.P.E.A. meeting by JACK R. CHILDRESS

Assistant Dean, School of Education, Northwestern University

AUTOMATION symbolizes the careful planning which is essential to all aspects of community life." The philosophy expressed in this relatively simple sentence permeated the 10th annual meeting of the National Conference of Professors of Educational Administration, August 26 to 31 at the University of Arkansas, Fayetteville.

"Automation and Its Meaning for Educational Administration" was one of the two major themes of the session. Three phases were discussed:

1. An interpretation of automation and its meaning for business and industry and for the working force.

2. The implications of automation for administering various facets of public or governmental activity.

3. The possible effects such an economic phenomenon will have on education and for the preparation of educational administrators.

## THREE CONSULTANTS PRESENT

The philosophy of involving personnel from other educational disciplines and related fields was continued in this conference through the active participation of three consultants: Robert W. Bolz, editor, *Automation Magazine*; Herman Limberg, senior management consultant, division of administration, office of the mayor, New York City, and John H. Fischer, superintendent of schools, Baltimore.

Dr. Fischer pointed out that "every society is constantly in a state of becoming, and its members who carry responsibility for training the young must be particularly aware of the direction in which this evolution progresses. Two hypotheses for education follow:

"One is that the effort to conserve human energy so that increasingly it may be turned to higher purposes is more than an economic undertaking. It must be accompanied by a plan of universal education designed to help as many people as possible develop

their individual potential and employ it in productive and satisfying ways.

"The second hypothesis is that the building of such educational programs will depend upon the insight, knowledge and skill of educational leaders and their ability to clarify for the people they serve the connection between educational means and cultural ends.

"All of our experience with democracy and all of our faith in people lead to the assumption that with such leadership, against the background of our traditions and under the impact of the current situation, the American people will give their sanction to the commitments that must now be made."

Mr. Bolz emphasized the social aspects of automation when he said: "Yes, automation will create jobs requiring more skill, more judgment, more responsibility, and less drudgery. It will give more people an opportunity to do creative work, to have better education and training, higher incomes, greater job opportunity and selectivity, more leisure and recreation. Properly implemented it can help continue the steady rise in our living standards."

Mr. Limberg emphasized the rôles of the school and of educational leadership through his interpretation of the belief that "automation is based on a thinking process and is the result of clear and thoughtful planning. The operations which lend themselves to automation are those which are manual and which can be done with a minimum of thinking. The general results will be an upgrading of job requirements. Education must prepare people who can think ahead and must be prepared to think ahead itself. People are necessary who can anticipate through planning what the machine will do and have to know."

## CONSENSUS ON AUTOMATION

Whether or not automation could be incorporated into the classroom and into administrative procedures became more and more secondary as the impli-

cations of the need to do long-range planning came to the forefront. From the three days devoted to this topic, several generalizations stood out regarding what "we in N.C.P.E.A. believe" about automation:

1. Emphasis in our culture and in our educational programs has been on the materialistic phases of life. The time has come to emphasize the consumption of the humanistic and artistic aspects of the present and of the past. Individuals must be more avid and more adequate consumers of all aspects of the culture.

2. The family in an era of automation, atomic development, or other economic phenomena may assume a greater rather than a more minor rôle in the life of children, in the life of adults, and in community activities. This development will necessitate a closer coordination of the efforts of the home and the school in the education of all individuals.

3. A rapidly expanding and changing economy will call for a continuing educational program for all ages to provide new skills for replaced workers and new understandings on the part of all groups for social and economic living and the better use of leisure time. A larger percentage of the individual tax dollar will undoubtedly be spent for adult or continuing educational programs to meet this need.

4. A more coordinated and a more generally accepted philosophy of involvement of many individuals in the decision making process will be a necessity in this new era. Children, students at all levels, professionals from all fields, and citizens in every community should be given opportunities to participate in creative thinking and decision making wherever feasible. The school must accept the philosophy that the development of creative decision making is a definite responsibility.

5. The utilization of automation in the processing of data enhances the opportunities for the educational programs of the country. Better information will be made available upon which to make decisions; tedious jobs may be taken from the hands of the teachers who can become more proficient and more creative in their approaches to classroom activities and the learning by children, and it may become possible to reduce the cultural lag between the economic and social facets of life.

(Continued on Page 118)

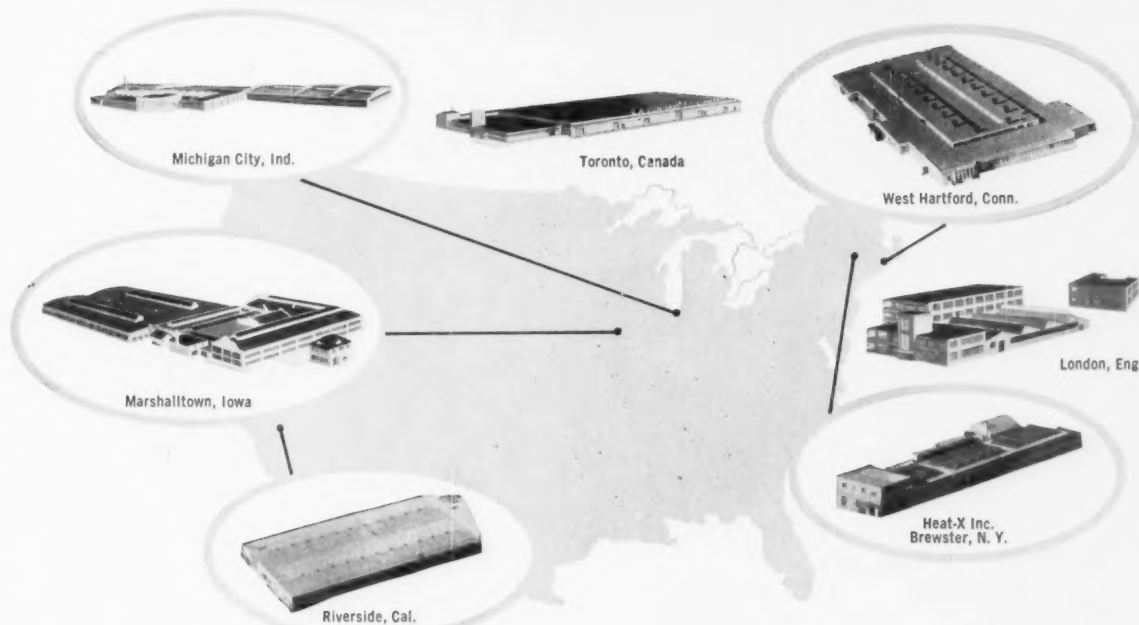




**TEAMED WITH**



**FOR EVEN GREATER GROWTH**



Heating, air conditioning and refrigeration products are flowing from the recently formed Dunham-Bush manufacturing facilities.

This "one-source" teaming of Dunham and Bush spells many advantages for architects, engineers, wholesalers and contractors.

A nationwide network of manufacturing plants and strategically located warehouses assures the "close-to-source" supply that permits faster delivery, lower freight costs. A substantially expanded force of sales engineers makes available on-the-spot engineering and application assistance. Greatly augmented resources and facilities permit continued research and development of new products to serve an expanding field.

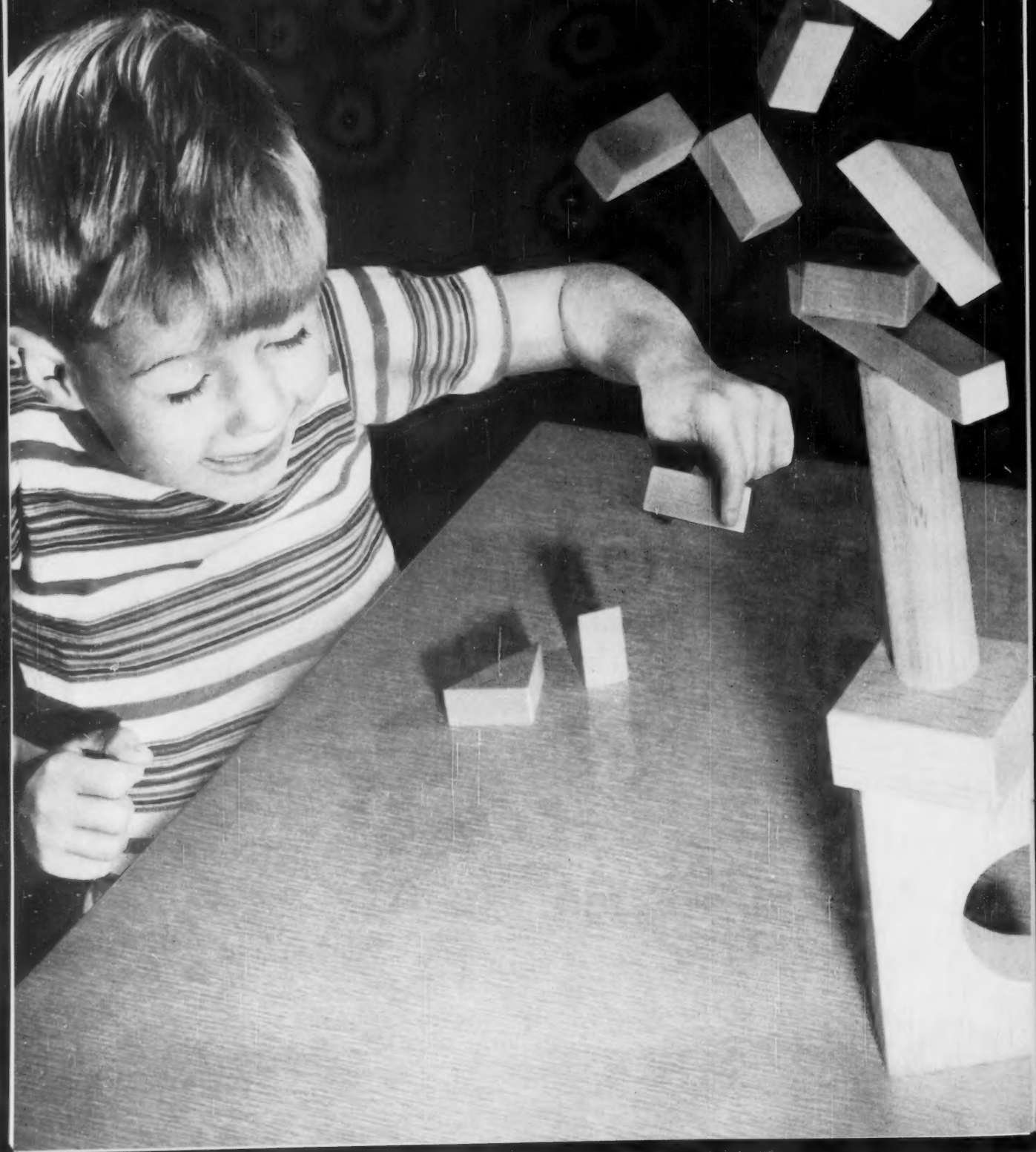
**Dunham-Bush . . . a single source, single responsibility for heating, air conditioning and refrigeration . . . teamed to serve an industry's growing needs.**

**Dunham-Bush, Inc.**

WEST HARTFORD 10 • CONNECTICUT • U. S. A.



AIR CONDITIONING, REFRIGERATION, HEATING PRODUCTS AND ACCESSORIES



# That's all right- it's PANELYTE®

**Protect tops of desks, tables  
with durable, beautiful plastic**

"Castles" go to pieces in classes every day, but there's nothing to worry about when the tables are surfaced with Panelyte. It won't crack like glass, won't chip like wood—Panelyte *behaves* as a school surface should! No upkeep problems, either. Even after years of dependable service, just a whisk of a damp cloth will make Panelyte look as new as the day it was installed.

Panelyte will also add beauty to every schoolroom. You'll be able to pick the perfect color to blend with any decor from Panelyte's complete range of authentic woodgrain finishes, marble effects, patterns and decorator solids. Since the color is baked in, you'll never have to worry about re-painting or re-finishing. And Panelyte's low reflectance value keeps glare away . . . is pleasant and easy on everyone's eyes.

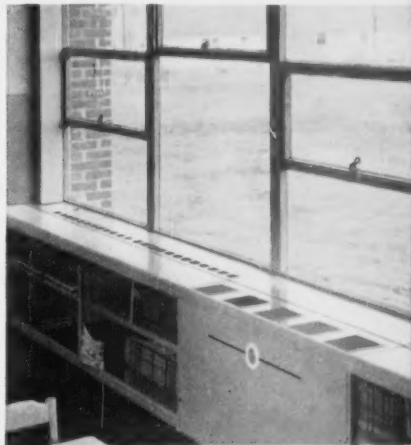
For free illustrated material and further information, write: Dept. NS-1056, Panelyte Division, St. Regis Paper Co., 150 East 42nd Street, New York 17, N. Y.

*Among the many other well-known firms using Panelyte are:*

Mid-West Folding Products  
Shwayder Bros., Inc.  
John J. Nesbitt Co.  
Educators Manufacturing Co.



Cafeteria Tables surfaced with Panelyte by General School Equipment Company



Classroom Radiator Guard surfaced with Panelyte by American Air Filter Corp., Herman Nelson Div.



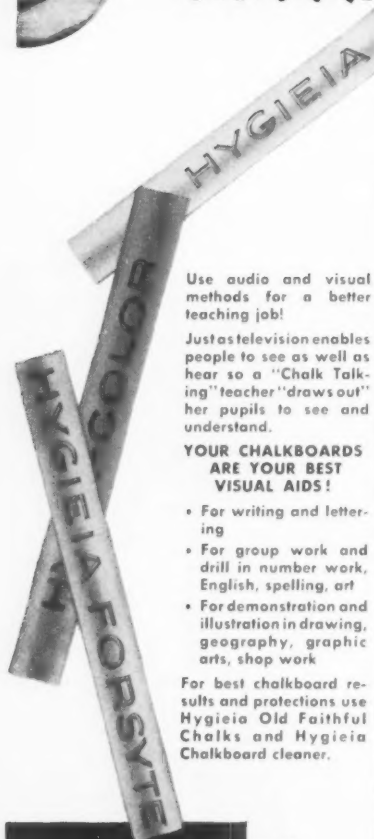
Junior Seminar Tables surfaced with Panelyte by Schieber Sales Company







**you  
talk  
better  
with  
CHALK!**



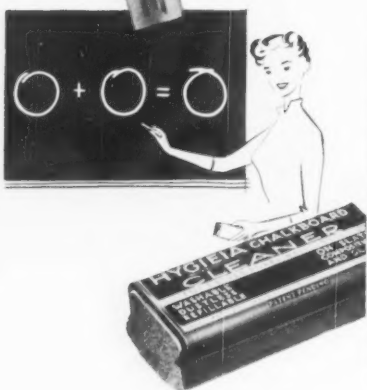
Use audio and visual methods for a better teaching job!

Just as television enables people to see as well as hear so a "Chalk Talking" teacher "draws out" her pupils to see and understand.

**YOUR CHALKBOARDS ARE YOUR BEST VISUAL AIDS!**

- For writing and lettering
- For group work and drill in number work, English, spelling, art
- For demonstration and illustration in drawing, geography, graphic arts, shop work

For best chalkboard results and protection use Hygieia Old Faithful Chalks and Hygieia Chalkboard cleaner.



Write for free circular on Hygieia's four-point chalk program. It's Free!  
Dept. NS-56

**THE AMERICAN CRAYON COMPANY  
SANDUSKY OHIO NEW YORK**

6. More and more people must be prepared for the social tasks which face the world as well as for the mechanical and engineering rôles which they will be called upon to accept.

7. If education is as important as it is believed to be, the programs for the preparation of administrative leadership deserve positive and active support. More financial underwriting, more philosophical undergirding or acceptance, and more total cooperative relationships will have to be accepted by university and college administrative officers and staffs.

**DISCUSS FORTHCOMING BOOK**

A forthcoming publication of N.C.P.E.A., tentatively called "Administrative Behavior in Education," served throughout the conference as a point of discussion for groups organized to examine the writings carefully, and as a referral point when groups were organized to follow theoretically other lines of reasoning. The importance of the book, the publication of which has been aided through a grant from the Kellogg Foundation, was at all times pointed up as a distinct contribution to the area of educational administration.

The early portion of the week's activities was directed to a thorough analysis of the various chapters and sections of the book by all members of the conference. Discussion groups were organized to examine the content, organization and the place of the book in the literature of the field with a representative group of authors and a team of critical readers.

Emphasis was placed on the fact that this book was not a "platform" for N.C.P.E.A., that it was not a symposium where the ideas were only those of the individual writers, and that certainly it could not be as "one-idea" centered as a single authored volume. However, the fact was underscored that every effort was being made to coordinate the various ideas in the book so that a consistent philosophy and not a conflicting one would be noted and that the following general ideas would be apparent:

1. The first section of the book represents an effort to establish a framework which will emphasize the broad background and social setting in which educational administration must operate. The contributions of the individual's value system and basic moral beliefs, of the contemporary social scene, and of the various other

administrative areas (business, government and so forth) to his administrative behavior were emphasized. Attempts were made to coordinate these ideas as well as to indicate the rôle that each would have in the background and in the preparation of educational administrators.

2. The further development of a theory of educational administration is essential if those who enter the field are to be properly oriented and prepared. This theory will have to encompass by necessity the task of educational administration, the situational factors which will be encountered, the administrative process, and the man involved. A design for research on administrative behavior will be essential as well as the development of the ability on the part of the individual to participate in and to interpret educational research.

3. The process of "developing" appropriate administrative behavior will be lost if consideration is not given to the impact it will have on the preparation of educational administrators.

The book is scheduled to be published in late 1957 or early 1958. Roald F. Campbell and Russell T. Gregg are co-editors. Periods were also devoted to the study of other areas of special interests of the members, to the analysis of specific activities of the practicing school administrator, and to those problems which seemed inherent in preparation programs.

**NEXT YEAR TO EUGENE, ORE.**

Previewed at the conference was a study developed by W. R. Flesher of Ohio State University and A. L. Knoblauch of Morehead State Teachers College, Morehead, Minn. It is designed to trace the history and to show the development of the philosophy of the National Conference through the first 10 years. In addition, various leaders in the conference tried to indicate the possible future of the organization and the tremendous task it faces in developing appropriate programs for the preparation of administrators.

A. D. Albright, professor of education, University of Kentucky, will act as chairman of the planning committee for the 1957 session, to be held at the University of Oregon, Eugene. He succeeds Walter A. Anderson, chairman of the department of administration and supervision, school of education, New York University.

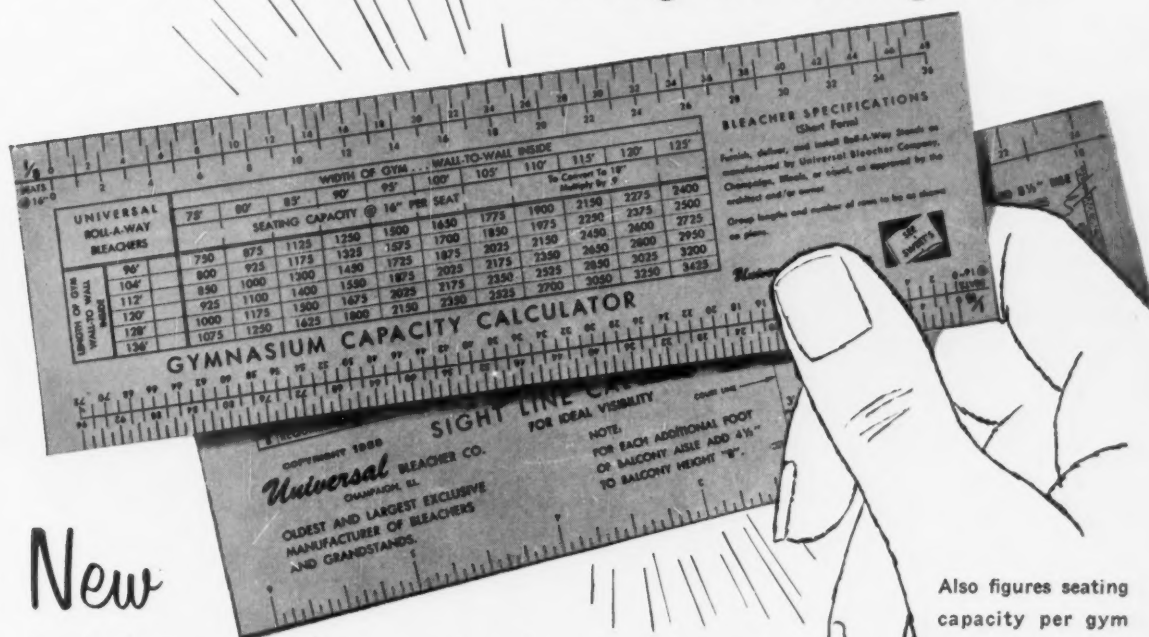
The 1958 conference will be held at Kent State University, Kent, Ohio.



# Planning a Gymnasium?



*Here's how to reduce cubage;  
make big savings on  
building and heating costs*



**New**

**Calculator enables you to plan maximum  
balcony seating with minimum ceiling height**

Designed by *Universal* engineers after years of on-the-job experience, this new calculator is now available to every architect and school official involved in planning a gymnasium. It is of inestimable value in determining balcony height for ideal seating sight line in relation to main floor seating. At the same time, it shows how such planning can reduce ceiling height to a practical minimum... for big savings in both building and heating costs. This calculator also figures seating capacities in relation to gym sizes, has 1/16", 1/8", and 1/4" scales as well as a standard rule. *Send for yours today.*

Also figures seating  
capacity per gym  
size... or vice versa

**IT'S YOURS  
FREE  
FOR THE ASKING**

**UNIVERSAL BLEACHER CO.  
Champaign, Illinois**

*I would like \_\_\_\_ (how many?) of your calculators  
which can be used to advantage in planning a new  
gymnasium. This request involves absolutely no cost  
or obligation to me.*

Name \_\_\_\_\_

Organization \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_

## NEWS IN REVIEW

### Riots, Referendums, Special Legislative Sessions Claim Headlines as Some Schools Attempt Integration in South

WASHINGTON, D.C. — The South's 1956-57 school year opened with integration a fact in districts enrolling an estimated 11 per cent of Negroes in that region.

In some spots integration took place quietly and with a certain dignity that bespoke careful preplanning. In other cities and counties, even within the borders of the same state, there were riots and mob disorders that eventually brought out state troopers, sheriff's deputies, and National Guard units.

White Citizens Council members within a few states led parents to resist integration efforts, and a rabble rouser from the nation's capital spearheaded the first outbreak, which was in Clinton, Tenn.

After the first two weeks the situation began to quiet down.

**Alabama Votes Continued Segregation.** Alabama's constitutional referendum on August 28 gave thumping approval to the so-called "freedom of choice" amendment, although the vote was light.

The amendment gives the legislature power to abolish the public school system, if it deems it necessary to maintain segregation. Voters also approved a public parks segregation measure.

**Florida Legislature Retains Separate Schools.** An extra session of the Florida legislature has passed five new measures designed to keep schools separate indefinitely.

Rep. John B. Orr Jr. of Miami cast the only dissenting vote, stating that he believes segregation is morally wrong and harmful to our international relations and that the existence of second-class citizens is repugnant to our democratic principles.

His opposition brought anonymous threats to his family and to his political future; it also brought him a barrage of telegrams and letters praising his courage and his stand.

**Louisiana's New Laws in Effect.** Ten of Louisiana's maintenance-of-school-segregation laws became effective August 1; the 11th goes into effect October 15, and a proposed constitutional amendment goes before the voters in November.

The laws and the proposed amendment take away from school boards and governing bodies the final authority for designating schools as white or Negro and give it to the state legislature.

This change, the segregationists hope, will knock the supports from under a federal court order that Orleans Parish must integrate "with all deliberate speed." This means New Orleans' 78,000 pupil system.

The October 15th date for the 11th bill to become law permits the professional baseball team to complete its season and the U.S. Naval Academy to meet Tulane before racial mixing in social functions, entertainments or sports becomes illegal and punishable by fines up to \$1000 and jail terms up to a year.

Under the new laws any high school

principal or school superintendent who signs a certificate of eligibility to a tax supported college for a Negro would appear to be acting in favor of school integration. To advocate integration in the schools is cause for dismissal of all school employees.

**Local Rule in North Carolina.** On September 8 in a referendum North Carolina voters approved by a large majority a constitutional amendment that provides the means of maintaining separate public schools.

The amendment allows elections in local school units on closing public schools if integration moves cause an "intolerable" situation and permits local funds to be used to provide private school tuition for children whose parents object to their attendance at an integrated school.

Gov. Luther Hodges describes the amendment as a "safety valve" that may prevent strife. (Cont. on P. 134)

### Business Officials Announce Headline Speakers and Round Table Chairman for Convention in Washington

WASHINGTON, D.C. — The 42d annual convention of the Association of School Business Officials will be held here October 7 to 11. Featured convention speakers will include Arthur S. Flemming, director of the U.S. Office of Defense Mobilization, J. Sinclair Armstrong, chairman of the Securities and Exchange Commission, and Capt. Richard B. Black of the U.S. Navy, Antarctic explorer.

Robert E. McLaughlin, chairman of the board of commissioners, District of Columbia, and Hobart M. Corning, superintendent, District of Columbia, will also address the group.

In section meetings on succeeding days, delegates will study aspects of schoolhouse planning, accounting and finance, purchasing, and maintenance and operations. School site selection, the school architect, specifications, and contracts will be the featured topics in the schoolhouse planning section, under the direction of H. S. Brannen, assistant business manager, Houston, Tex., and Temple B. Mayhall, director of school plant, Austin, Tex.

The section on accounting and finance will meet in three regional groups to discuss the organization of

(Continued on Page 122)



Arthur S. Flemming



Capt. Richard B. Black



J. Sinclair Armstrong



At Southwest Elementary School, Evergreen Park, Ill., learning is easier because Owens-Illinois Glass Block eliminate the excessive glare and harsh contrasts that strain young eyes. Glass block direct daylight upward, diffuse it throughout classrooms all day long.

A sky screen of  
Owens-Illinois Glass Block  
provides

*better light*

to protect precious sight



Architect: Bryant and Walchi, Chicago, Ill.  
Contractor: Mercury Builders, Chicago, Ill.

EVERGREEN PARK's beautiful Southwest Elementary School is but one of hundreds of new schools from coast to coast that are utilizing the outstanding advantages of Owens-Illinois Glass Block. For example:

Glass block practically eliminate

maintenance costs . . . won't rust or rot like ordinary window sash . . . eliminate painting and old-fashioned window shades . . . are difficult to break. Heating and lighting costs are greatly reduced because glass block insulate and daylight so efficiently.

If you are planning to remodel your school or erect a new one, be sure to investigate the important benefits offered by Owens-Illinois Glass Block. For complete information, write Kimble Glass Company, subsidiary of Owens-Illinois, Dept. NS-10, Toledo 1, Ohio.

OWENS-ILLINOIS GLASS BLOCK  
AN **(I)** PRODUCT

**OWENS-ILLINOIS**  
GENERAL OFFICES • TOLEDO 1, OHIO



## Business Officials Announce Convention Speakers

(Continued From Page 120)

the new A.S.B.O. handbook and implementation of it, the handling of replacements, receipts, expenditures, new accounts, the clearing of accounts, equipment, and per pupil costs. Joseph P. McElligott, supervisor of accounts, San Francisco, and Lillian C. Tucker, secretary-purchasing agent-treasurer, Highland Park, Ill., are executive chairman and secretary, respectively, of this section.

In the purchasing section, a school business management handbook, "Purchasing and Stores," published in 1955 by the education department of New York State, will be discussed. Executive chairman of this section is G. Alvin Wilson, assistant superintendent, Oak Park, Ill., and general chairman is Joseph L. Ernst, director of purchases and stores, Rochester, N.Y.

New lighting concepts for schools, the relative merits of coal, gas and oil heating, and preventive maintenance will be the topics presented in the maintenance and operations section, under the direction of P. M. Muir, executive director, Ontario School Trustees Council, Toronto, Ont., and H. B. Rockley, business administrator, London, Ont.

Delegates also will have the opportunity to participate in round table discussions on the following subjects: business management, chairmen, P. M. Muir, and J. Harold Husband, Grosse Pointe, Mich.; transportation, chairman, Andrew C. Hutson Jr., Knoxville, Tenn.; insurance, chairman, Schuyler C. Joyner, Los Angeles; personnel, chairman, Robert Fisher, Los Angeles; maintenance and operation, chairman, H. S. Brannen; new building construction, chairman, Norman Aaron, Atlanta, Ga.; student body expenditures, chairman, Cliff Davis, Los Angeles, and cafeteria, chairman, Cleta Swingle, director of cafeterias, Washington, D.C.

Three sightseeing tours of the capital city and vicinity have been arranged as a part of the convention.

## State Ruling Upholds Teachers Who Refuse to Be Informers

NEW YORK.—State Commissioner of Education James E. Allen Jr. has ruled that no teacher can be fired for refusing to name other teachers who are or were Communists.

His ruling came as the result of appeals by five teachers and a principal

who had been suspended when they refused to testify against other teachers. Although freed of this charge, the five will be prosecuted and probably will remain suspended on other charges.

In announcing his ruling, Commissioner Allen said that he was convinced that this type of inquisition had no place in the school system and could do more harm than good. It engenders an atmosphere of suspicion and uneasiness in the schools and colleges, he said, and destroys the trust necessary to keep morale at a high level.

Further, he stated that he opposed such practice because "it establishes as an official test of good faith a teacher's willingness to act as an informer."

## Man or Mouse Wanted for Commissioner's Job? Editor Asks

NEW YORK.—Before a new U.S. commissioner of education is found, someone must answer the question of whether a man or a mouse is wanted, according to Sloan Wilson, education editor of the *New York Herald Tribune*.

In a recent column, Mr. Wilson describes some of the characteristics of the Office of Education which he believes have deterred top professional men from rushing to apply for the job. The functions of the office and its executive have never been clearly defined, he says. Furthermore, there has never been enough money to carry out even those functions which are clearly understood.

Describing the Office of Education as "anemic," the editor said that few commissioners have been able to be real leaders. A salary of \$14,500, recently raised to \$16,000, compares unfavorably with salaries available to big city superintendents, making it difficult to attract top men. In addition, the lack of tenure has made it difficult to be a "fearless" leader for long.

While it will probably be necessary to appoint a new commissioner before any significant changes can be made, there are indications that the government is seriously considering some revisions. Herold C. Hunt, present undersecretary, has stated that the Secretary of Health, Education and Welfare has expressed interest in making the position a seven-year term appointment and in raising the commissioner's salary to \$20,000.

Such steps would be a good start toward "making the Office of Education the dynamic planning center which is needed," Mr. Wilson said.

## W. S. Crewson to Succeed Dr. Moffitt in New York Post



Walter S. Crewson

ALBANY, N.Y.—Walter S. Crewson took office September 1 as special assistant to the New York state commissioner of education. He has been

superintendent of schools at Levittown, N.Y., since 1954. On December 1 he will become associate commissioner in charge of elementary and secondary education succeeding Frederick J. Moffitt. Dr. Moffitt's terminal leave began September 15. Also known to readers of *The NATION'S SCHOOLS* as the author of "Chalk Dust," he is joining the Silver Burdett Publishing Company as editor of professional publications. He also will continue to write "Chalk Dust."

Dr. Moffitt had been a member of the New York state department since 1941. Previously he had been a school principal and superintendent in New York State and director of public relations for the New York State Teachers Association.

Mr. Crewson served as superintendent at Hamilton, Ohio, from 1948 to 1954. Previously, he had been a teacher and an elementary school principal in schools in Summit and Stark counties, Massillon and Cuyahoga Falls, Ohio; assistant principal and director of the evening school at Massillon, and superintendent at Barberton. He received his B.S. in Ed. degree from Kent State University, Kent, Ohio, his M.S. degree from the University of Chicago.

## 36 Portable Classrooms Approved at General Election

HICKSVILLE, N.Y.—Thirty-six portable, temporary classrooms will be purchased by the board of education of this Long Island town as an answer to the classroom shortage.

The board was authorized to spend up to \$695,000 on the classrooms at a special election here last month. The classrooms, one-story steel and plywood prefabricated units, will probably be transported from the seven elementary schools to the junior and senior high schools, as peak enrollments progress.

The plan, supported by the Hicksville Citizens for Better Government in School Affairs and opposed by the building committee and the citizens advisory committee, was passed by a margin of only 73 votes.





*Stop Costly  
Childish Pranks in  
Your Washrooms!*

*Straubel*

single dispensing towels  
dry faster and better—  
eliminate roll towel  
streamers and clutter

**T**HERE'S no question about it, you cut costs materially with Straubel's single towel dispensing service. Remember, too, just ONE soft, absorbent TEXTURIZED towel is sufficient to dry *both* hands thoroughly! Neater to use, too, because they're wet strength treated and do not easily disintegrate or shred—leave fuzz or lint on skin or clothing. Multifold or singlefold packs fit all standard cabinets but you'll fill Straubel cabinet No. 82-2 less frequently, because it holds *two* 250 towel packages. Write for "test-try" complete sample kit.

**Stop costly tissue streamers, too!**

Straubel's exclusive "Convenience Cut" roll tissues dispense but two sheets at a time . . . Stop costly roll spinning, eliminate unsightly, wasteful unused tissue streamers. Sanitary, soft, absorbent Natural or Bleached White tissues in 1500 or 2000 sheet rolls — Also, interfolded packs for recess or cabinet dispensers.



STRAUBEL PAPER CO. • GREEN BAY • WIS.



Sold only through  
reliable Distributors of  
paper products. Write  
for dealer's name best  
located to serve you.

**mowing big places**

**BIG WHEELS  
Have It!**



Rotary Model 7A-3-22, 3.0  
hp, 22" cutting width

**HERE'S WHAT CITY OFFICIALS** . . . commercial users the country over say about **YAZOO BIG WHEELS**: "The way it will cut high grass is something . . ." "We have big rental projects . . . one of your machines wears out two ordinary mowers." "We believe it to be the best mower on the market at any price . . ." "Better performance . . . longer service . . . easier to repair!"

**YAZOO HAS BIG BICYCLE-TYPE WHEELS** for smooth, easy maneuverability. YAZOO guarantees longer service with harder use—at lower maintenance cost! YAZOO gives quality at a price . . . performance that can't be matched by any other mower in America. There's no other mower like the YAZOO in the power mower field today!

Write, Wire or Call Today for Catalog,  
Prices, Complete Information:

**YAZOO MANUFACTURING CO.,**  
Box 4527 • 3607 Livingston Road  
Jackson, Mississippi

**YAZOO** (YAZZ-ZOO)  
**MASTER MOWERS**

**America's Finest Power Mower**

## Seventh Graders Top Future Science Teachers

NEW YORK.—Sixty future science teachers here were topped in their knowledge of science by seventh graders. The pupils averaged 14 per cent higher in a science test reported on by Leonard S. Davenport, science consultant in the elementary grades at Roslyn, N.Y., and professor of science at Hofstra College, Hempstead, N.Y.

Many of the future teachers, now college students in their junior and senior years, thought that the way to

put out a fire was to smother it with oxygen. Many thought they would see a full moon every week.

"Incredible," said Dr. Davenport. "If this is a fair sample of elementary science teachers—and I think it is—we are in for serious trouble."

Many of these students are already teaching this fall.

The college students, who averaged 71 per cent on the test (elementary pupils averaged 85 per cent) were given twice as much time to take the test as were the seventh graders and could keep their books open as well.

Dr. Davenport advocated a higher salary schedule, improved working conditions, more emphasis on general science courses in both high school and college, and renewed interest in teacher preparation courses to attract better qualified teachers.

## School District Not Sure What to Do With \$426,000

EAST MEADOW, N.Y.—The school district here is planning to save "for a rainy day" the \$426,000 it received last month from the federal government. No one quite knows what to do with the money, which is part of a government grant of \$1,026,000 promised to the district in 1954 because it serves children of defense plant workers and Mitchel Air Force base personnel.

But the school district of this Long Island town saw only \$600,000 of this amount before government appropriations for 1954 were used up. The state provided the rest of the money needed to complete the junior high school under construction.

The district, which now falls into the state-aid category, cannot use the government grant for school expansion. It cannot use the money to retire part of its bonded debt of \$23 million or New York State will recompute cost allowances on finished buildings constructed with state aid and thus reduce drastically such aid.

John H. Borrie, attorney for the school board, who bought government bonds with the money, commented, "We'll save it for a rainy day. There's no time limit during which it must be spent."

## Would Admit Gifted Child to First Grade Work Early

LINCOLN, NEB.—Getting gifted children off to an early start in school is a good idea—rules to the contrary—according to a University of Nebraska study directed by D. A. Worcester. Most schools systems have a rigid ruling concerning school admittance, which is based on age and does not take intelligence into account.

However, the Nebraska study recommended admitting bright children to the first grade even though they have not reached the legal entering age for these reasons: The child will be placed with children who are more nearly his social and mental equals from the beginning and will be less likely to develop habits of dawdling and laziness; teachers are made more

## mackin visual education blinds let you control the darkness

for every type of projection . . .



black & white

color

opaque

### eliminates double equipment and maintenance . . . . .

One unit gives complete light control of sun and glare and still darkens for visual education work. It does the whole job and costs less!

### chain operated . . . . .

No cords to wear out and require replacement.

### removable slats . . . . .

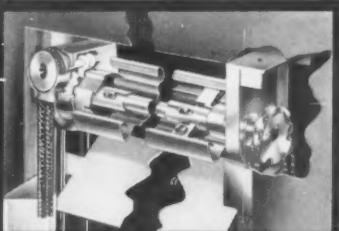
Just lift them out, clean and slip back in. No complicated unstringing and restringing as ordinary blinds require.

### controlled travel . . . . .

Slats travel up and down within a special molded channel. This controlled travel feature prevents blinds from blowing and banging in the wind.

### light control shields . . . . .

A cleverly-designed device which presses the blinds' slats tightly against the channels, Mackin's Light Control Shields are simple triangular strips mounted vertically—at each side of the blind. An integral part of the blind—not extra attachment requiring separate installation.



### new rail seal . . . . .

New plastic bottom rail seal raises and lowers with the blind. Doesn't require holes and boxes on the window sill.

### tapes . . . . .

Standard venetian blind tapes, not specially constructed.

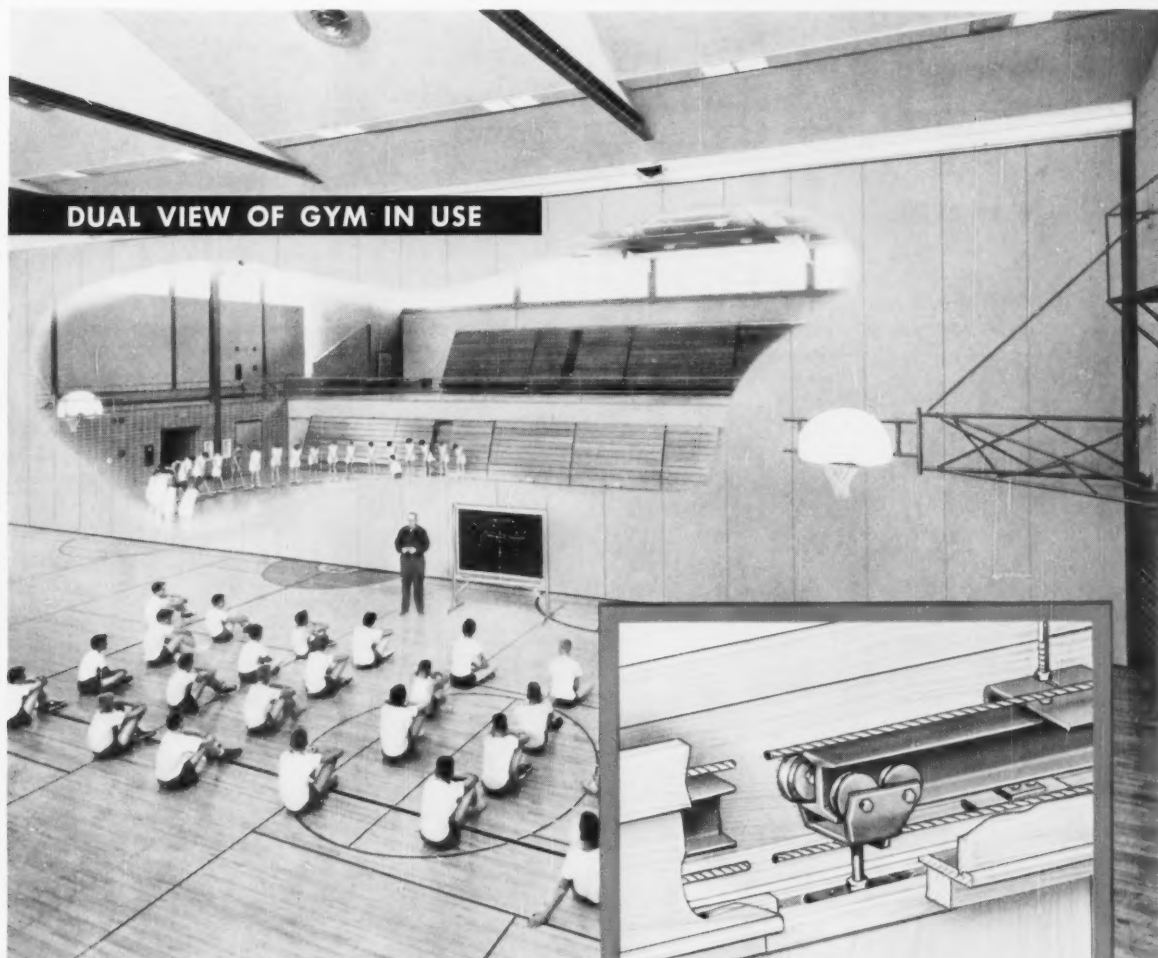
### get the facts now!

Send today for free catalog and complete information on Mackin Visual Education Blinds.

**mackin venetian blind co.**  
momence, illinois

## Exclusive feature of Brunswick-Horn folding partitions

### DUAL VIEW OF GYM IN USE



Glenbrook High School, Glenview, Illinois; Perkins & Will, Architects

### Four-wheel "Y" yoke trolleys give smoother, easier operation

Here's an important exclusive feature that results in smoother, easier operation of your folding partition when you specify Brunswick-Horn. Each "Y" yolk trolley operates on four precision machined cast steel rollers that fit the contour of the "I" beam track perfectly. Pre-lubricated needle bearings as-

sure long, trouble-free use. This means perfect alignment between track and trolley at all times, maximum support for the full weight of the partition.

Why not discuss *all* of these fine features of Brunswick-Horn folding partitions with your nearby representative today?

See SWEET'S <sup>22d</sup>  
Ho

THE BRUNSWICK-BALKE-COLLENDER COMPANY  
Horn Division • Marion, Virginia





Improve the picture on the screen . . .



with a

## G-E PROJECTION LAMP

behind the scene

You get more out of your projector—slide or movie—when you put a General Electric projection lamp into it. You can especially enhance the performance of *older* projectors by replacing the old lamp with a new improved G-E lamp. Here are some of the reasons why you can expect best results from your projector—old or new—when you use G-E projection lamps:

- Higher gas pressure and mechanically formed filaments *increase light output, increase lamp life, provide more uniform light on the screen.*
- Safety fuse prevents damage to projector socket and protects circuit fuse.
- Correct for color and black and white.
- Finest, most complete line.

See your local General Electric Photo Lamp supplier—he will aid you in the selection of the proper lamps for *all* your projection equipment. Photo Lamp Dept., General Electric, Nela Park, Cleve. 12, O.



**GENERAL**  **ELECTRIC**

aware of the particular needs of the bright children by recognizing them when they first start school; the school system as a whole becomes more sensitive to the problem of the gifted, and the child is able to complete his education a year earlier.

The study also approved the old-fashioned practice of allowing the superior child to "skip" a grade.

### Chicago Starts Telecourse in English for High School Credit

CHICAGO.—Chicago citizens who haven't had a chance to finish high school or who find it hard to express themselves well in the English language can now take a telecourse in freshman English. N.B.C. and the Chicago Board of Education are joint sponsors of the course.

The telecast, over Channel 5, is in color and in black and white and is given on Sundays at 10:30 a.m. To get credit the student also goes to one of eight Chicago high schools for an hour's class on Wednesday evenings. Those who do not wish high school credit or cannot attend the Wednesday evening class are sent a course outline for a fee of \$1. Tuition for credit students is \$7.50, the regular Chicago night school charge.

William Earwaker, 29 years old, a high school English teacher in Chicago, will teach the telecourse. To carry over his personality and to give more continuity to the course, Mr. Earwaker will visit the high schools in rotation on Wednesday evenings and will answer questions.

The "Modern English" course is a part of WNBQ's Live and Learn series. Freshman English was selected because more Chicago evening school students take that subject than take any other course, Supt. Benjamin C. Willis declares.

### A.F.T. to Put More Emphasis on Collective Bargaining

PITTSBURGH.—The American Federation of Teachers has announced a nationwide drive to establish the practice of collective bargaining for teachers.

Teachers, administrators and school board members must face each other across the conference table with equal dignity, discussing problems and arriving at solutions, said Carl J. Megel, president of the A.F.T. Agreements reached in this way must be put into writing, he added, stating that the A.F.T. must put into practice "meth-



# Introducing the DRYMASTER

most economical, most compact  
Rinse Injector on the market



## NOW EVERY DISHROOM CAN

Cut Costs! Reduce Breakage Due To Excess Handling! Get gleaming, sanitary, dry tableware—right from your dishmachine!

- Fits any machine, big or small, wherever convenient!
- Designed for Rinse-Dry—first and finest concentrated drying agent!
- Most accurate injector available!
- No electrical connections necessary!
- Gadget-free, trouble-free, installed free.

\*Provided you use only E. L. Rinse-Dry in your DRYMASTER.

Learn how the DRYMASTER lets you profit from Economics Laboratory's famous Rinse-Dry Method, regardless of the size of your business or budget. Call your nearest Soilax Sales Office, or mail the coupon. ▶

Gentlemen:

Please send me complete information on the DRYMASTER.

Name \_\_\_\_\_ Title \_\_\_\_\_

Firm \_\_\_\_\_

Street \_\_\_\_\_ City \_\_\_\_\_ State \_\_\_\_\_



ods and technics that have stabilized other professions, trades and occupations."

Among the goals A.F.T. would seek across the conference table, Mr. Megel named: a single salary schedule, starting at \$5000 and reaching \$9000 in nine steps; better teacher retirement pensions supplemented by Social Security; published personnel procedures; state tenure laws to protect teachers from being discharged without proper hearing; adequate accumulative sick leave and hospitalization.

Compromise marked the federation's

action on integration, with a resolution ordering the expulsion of eight southern locals, if they did not eliminate segregation within their organizations by Dec. 31, 1957. An earlier resolution, which did not pass, called for expulsion of the groups by March 31, 1957, if they did not delete all references to race from their charters.

Both white and Negro locals would fall under the ban, affecting some 3000 members. White locals to be ousted would include Fulton County and Atlanta, Ga., New Orleans, and Chattanooga, Tenn. Negro locals were from

Atlanta and Capital City, Ga., New Orleans and Mountain City, Tenn. The federation proposes to establish one new integrated local in Atlanta, Fulton County, New Orleans and Chattanooga, if the existing groups are expelled.

### Winthrop Rockefeller Subsidizes Arkansas Model School Project

MORRILTON, ARK.—To assist the people of this city of 5000 in developing a model school system, Winthrop Rockefeller has underwritten a five-year project of school improvement.

Mr. Rockefeller will pay for an extensive school plant, including the grounds, to house an improved program. The whole plan is to be a "growth process," according to Arch W. Ford, state commissioner of education.

"Enrichment of the Morrilton program will be added only to the extent that the local school board is willing to commit itself to maintain it at the expiration of the five-year period," Commissioner Ford continues.

"For example, only \$75,000 for enrichment is being accepted for the first year because this is all the board was willing to commit the people of Morrilton to assume at the end of the five-year subsidy. Mr. Rockefeller offered to supply up to \$125,000 the first year."

Mr. Rockefeller's fabulous farm, Winrock, lies near the town of Morrilton. The Morrilton schools also serve a considerable rural area. As a new citizen of Arkansas, Mr. Rockefeller is said to believe that the South in this period of economic transition needs some education projects that will tempt people to improve their schools as other things improve. He believes that good schools will help bring industry to the South and wants to prove it.

The staff of the state department of education and of the state teachers college at Conway and members of the U.S. Office of Education staff will act as consultants throughout the life of the project, it is announced. Ray L. Hamon of the Office of Education is acting as a consultant on the building program.

The state department of education has already made a survey covering buildings and grounds, curriculum, equipment and instructional supplies, and personnel.

Approximately 2000 pupils attend the Morrilton schools; about 85 per cent of them are white and the remainder, Negro.



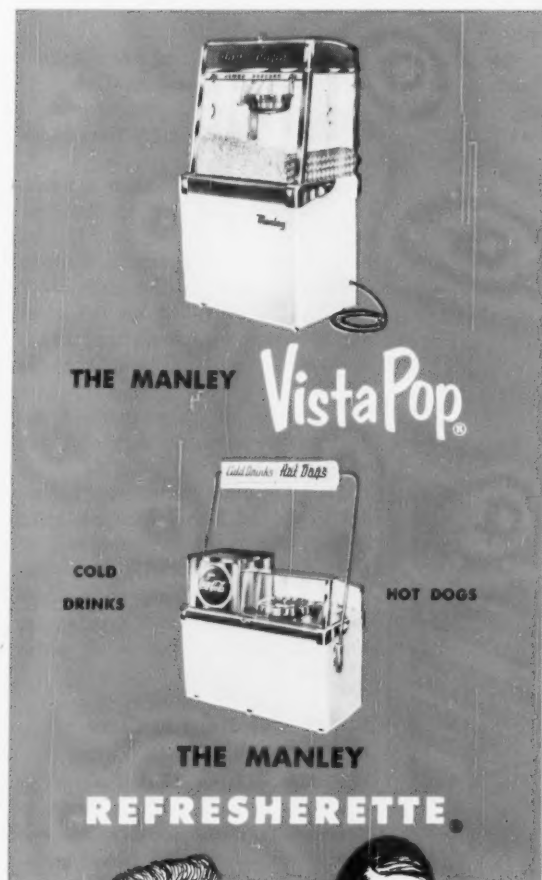
## VALUABLE *NEW* PLANNING AND EQUIPMENT GUIDE *FREE!*



Home Economists . . . School Administrators . . . all who take part in the planning of school homemaker classrooms will want to make use of this valuable planning and equipment guide. 32 pages . . . filled with pictures, ideas and plans for the homemaker classroom. Prepared by a recognized leader in the field of steel kitchen and school casework manufacture. Free on request to Home Economists and School Administrators. For your free copy of "PLANNING HOMEMAKING CLASSROOMS" write on your letterhead to

St. Charles Manufacturing Co., Dept. S-50, St. Charles, Ill.

# Do-It-Yourself with MANLEY FUND BUILDERS



Let the Manley VistaPop Popcorn Machine and the REFRESHERETTE Snack Bar provide the necessary funds to buy:

- ★ Athletic Equipment
- ★ Uniforms
- ★ Film Projector
- ★ Band instruments
- ★ Record player
- ★ Or many other items your school needs and wants

## HOW THIS WORKS FOR YOU

At football, baseball and basketball games, dances . . . any place where crowds gather there's always a desire to eat popcorn and hot dogs . . . to drink cold drinks.

At such time, a Manley VISTAPOP and REFRESHERETTE on the spot to fulfill these desires will do a "land office" business.

The profits you make from the sale of popcorn, hot dogs and soft drinks will supply the funds for many worthwhile needs, not provided for in the budget.

## Easy To Operate in Minimum Space

- ★ Any student can learn to operate either piece of equipment in just 10 minutes!
- ★ The VISTAPOP POPCORN MACHINE takes only 9 square feet of floor space . . . the REFRESHERETTE only 14 square feet.

**MANY OTHER SCHOOLS LIKE YOURS HAVE BUILT EXTRA FUNDS WITH MANLEY EQUIPMENT. Your school can benefit, too. FILL OUT THIS COUPON. We'll be glad to send you more information.**

MANLEY, INC., Dept. NS-1056

1920 Wyandotte, Kansas City, Missouri

- ☐ Please send me additional information on the Manley VISTAPOP.
- ☐ Please send me additional information on the Manley REFRESHERETTE.
- ☐ Please have a representative call on me to explain how these Manley Fund Builders will work in our school. I understand that I will be under absolutely no obligation.

Name \_\_\_\_\_

Title \_\_\_\_\_

School \_\_\_\_\_

City \_\_\_\_\_

Zone \_\_\_\_\_

State \_\_\_\_\_

**MANLEY, INC.**  
1920 Wyandotte St.,  
Kansas City 8, Mo.

## Republicans Urge Federal Aid to Building, Expanded School Lunch

SAN FRANCISCO.—The Republican platform, adopted here, pledges the party to a program of federal assistance to school building and of "state and local efforts to build more classrooms." No specific mention is made of school health and welfare services, but the party is pledged to expand the school milk and the school lunch program.

"The Republican party is determined to press all such actions that will help ensure that every child has

the educational opportunity to advance to his own greatest capacity," the platform reaffirms.

The platform also mentions that the present Administration proposed a nationwide analysis of problems in education beyond the high school.

## Democrats Offer Welfare Services to Private and Parochial Pupils

CHICAGO.—For the first time a major political party has specified in its platform that "public funds be used to give health examinations, bus transportation, and safety and welfare serv-

ices to all school children." The news service of the National Catholic Welfare Conference interprets the wording of the education plank of the Democratic party as advocacy of public funds for health and safety services for children in private and parochial schools as well as public.

The platform reads, in part: "We pledge the Democratic party to the following:

"Legislation providing federal financing to assist state and local communities to build schools and to provide essential health and safety services for all school children.

"Better educational, health and welfare opportunities for children of migratory workers.

"Assistance to programs for training teachers of exceptional children.

"Programs providing for the training of teachers to meet the critical shortage in technical and scientific fields.

"Expansion of the program of student, teacher and agricultural exchange with other nations."

The platform indicates that federal aid should be provided to education "within the traditional framework of state and local control." It further urges "a continuing expanded school lunch and special milk program to meet the dietary needs of all school children."

## School May Have to Close in Peoria, Ill.; Up to Voters

PEORIA, ILL. — With a history of voter opposition to school tax referendums and bond issues, the citizens here face a critical election November 6. According to the school board president, George N. Miles, voters must raise the educational tax rate, or the schools will have to close by November 1957.

Current educational tax rate in Peoria is 75 cents per hundred dollars of taxable property—one of the lowest in Illinois for combined grade and high school districts. Referendums to raise the rate have been held five times since 1951, the issue having been voted down each time.

The present appeal calls for a 40 cent increase to pay teachers' salaries. "There are no educational frills in this request," said Robert C. Day, an attorney who head a citizens committee fighting for passage of the referendum. "If we don't get relief, the schools will have to close within the year."

# America's Preferred Combination Padlocks!

## Master COMBINATION PADLOCKS

- DURABLE
- LOW COST
- STAINLESS STEEL CASE CONSTRUCTION

Master Combination Padlocks give you 2-way budget relief — low initial cost and long-lasting, trouble-free service! Double wall construction . . . hardened steel locking latch . . . automatic re-locking mechanism . . . and other security features. One school-owned control key opens all locks.

**MASTER NO. 1525**  
MASTER KEY CONTROLLED  
TWO YEAR GUARANTEE



**MASTER NO. 1500**  
Same design and construction as No. 1525 . . . but without key control. Full two-year guarantee.

Builders of the World Famous Master Laminated Padlocks

**Master Padlocks**  
NO. 1 IN AMERICA'S SCHOOLS

**Master Lock Company.**  
Milwaukee 45, Wis.

*World's Largest Padlock Manufacturers*





## Even a snail sails

*when you use Royal "Touch Control" for teaching on Electric typewriters*

It seems like teachers by the thousands are clamoring for new Royal Electric Typewriters these days. And especially for Royal's exclusive adjustable "Touch Control"!®

Teachers say it makes it so much easier for a student to switch from the "firm" action of a manual typewriter to the powered light action of an electric. *It actually saves many hours of classroom time.*

You simply turn a dial on a Royal and you "firm up" the touch. Then as the student adjusts you gradually reduce it to a light touch again.

Of course, this is *only one* of the many reasons why Royal Electrics are preferred in schools today. Why not call in your Royal Representative? Let him show you right in your own classroom just how this wonderful new Electric typewriter can save you many hours of teaching time.

**ROYAL**® *electric • portable • standard*  
*Roytype® business supplies*

Royal Typewriter Company, Division of Royal McBee Corporation



NEW Rolling Fields Elementary School, Kettering, Ohio

## These *new* and *old* schools get benefits . .



Rolling Fields Elementary School, Kettering, Ohio. Architect: Rial T. Parrish, Dayton, Ohio; Superintendent: Dwight L. Barns

An attractive, functional 22 classroom school, built at low cost—\$8.63 per square foot. Extensive use of PC Glass Blocks made possible not only savings in original construction costs, but will produce savings in annual operating and maintenance costs as well.

Reasons for the extensive use of glass blocks in both new school construction and school modernization are amply documented in the two schools featured here.

Let's look first at the new Rolling Fields Elementary School, Kettering, Ohio, shown on this page. Here, the requirements from the school planners called for minimum construction costs without sacrificing proper classroom environment.

One big answer to both needs was the extensive use of PC Glass Blocks. Green-tinted Suntrol Blocks were installed to control daylight inside the classrooms scientifically, and to reduce glare. Costly glare-reducing devices were eliminated. Under the Suntrol Blocks, vision-permitting Vue Blocks combined with ventilator units, add still more savings—approximately \$8,500 over the more expensive vision strip construction. Savings in school operating costs figure in, too. The high insulation value of the glass block panels installed in the classroom walls permitted the designers to use a smaller boiler size which contributes to lower heating costs. The per-square-foot construction costs for this school—\$8.63.

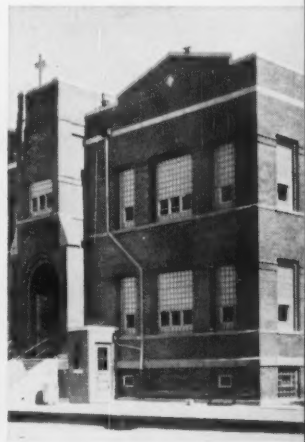


REMODELED Sacred Heart School, Toledo, Ohio

## at low cost with PC Glass Blocks

At Sacred Heart School, Toledo, Ohio, the big question facing Reverend Alfred J. Metzger, Pastor, was—"Shall we build a new school, or remodel the old one?" Part of the decision in favor of remodeling involved a satisfactory answer to improving classroom lighting, eliminating existing window maintenance problems, reducing heating costs, and dressing up the exterior. Investigation convinced the planners that functional glass blocks would meet all these needs. This, coupled with the fact that complete remodeling would cost less than half the cost of an equivalent new structure, brought in the vote for modernization. PC functional Glass Blocks have changed dark classrooms into bright, cheerful rooms with controlled daylighting that bans glare and shadows. Heating costs have been reduced. Window maintenance is a headache of the past. And the glass blocks helped give the exterior an architectural "face-lifting" that took years off the age of the school.

Our booklet, *The 3 R's and Daylighting*, tells more of this benefit story. Write for a copy. Pittsburgh Corning Corporation, Dept. AK-106, One Gateway Center, Pittsburgh 22, Pa. In Canada: 57 Bloor St. West, Toronto, Ont.



Sacred Heart School, Toledo, Ohio. Pastor: Rev. Alfred J. Metzger  
"Before" and "After" photographs showing improved exterior. PC Glass Blocks, installed with aluminum ventilator units, eliminate rotting and rusting of sash, painting, and breakage replacement. Washing is seldom necessary and can be done quickly with a hose.



## PC Glass Blocks

Also manufacturers of FOAMGLAS® insulation





## Riots and Referendums as Some Schools Try Integration

(Continued From Page 120)

The maximum state grant for private school tuition would be only about \$135 a year per student. There are relatively few private schools in the state.

**Virginia Legislature Meets.** The special session of the legislature called by Governor Battle continued to hear arguments on bills to continue school segregation by legal means as this issue went to press.

The special session opened August

27 and in the three days set aside for receiving bills on the subject accumulated more than 70 measures to consider. It appeared probable that responsibility for Virginia's segregated schools would be placed on the governor.

## Children of Migrants Get Summer Work in New York

CUTCHOGUE, N.Y.—This Long Island village concluded in late August its first summer session for the children of migrant potato diggers.

Twenty-five children, ranging in age

from 6 to 13, took part in an experimental program sponsored by the New York State Education Department. A similar program for 35 migrant children took place in Albion, in the western part of the state.

Most of the children came from segregated schools in Georgia, Florida and North Carolina and were retarded in their school work. Their parents are often on the move, it was reported. If the children did not have suitable clothing, the school provided them with new outfits.

Many of the children live six, eight or ten to a room in a cooperative labor camp maintained by potato growers.

The director of the camp is also chairman of the East Cutchogue school board and a large potato farmer. "We want these children to get an education even though we know that, once they get it, they won't want to dig potatoes for us," he declared.

## Can Attend Junior College Entirely by TV in Chicago Area

CHICAGO. — A complete junior college education via TV is being planned for interested viewers in the Chicago area. The first credit courses, including a political science class, a biology class, and a sociology class are being offered this fall over Channel 11, the city's educational TV station.

The two-year sequence can be completed in three years. Registered viewers may obtain credit by reporting for final examinations to Chicago Junior College. Benjamin C. Willis, superintendent of schools, announced that this will be the first time a full two-year college sequence has been available on TV anywhere.

Classes will be televised "live" during the day and will be presented via kinescope one week later to evening viewers.

## L. P. Cushman Superintendent at Oak Ridge, Tenn.

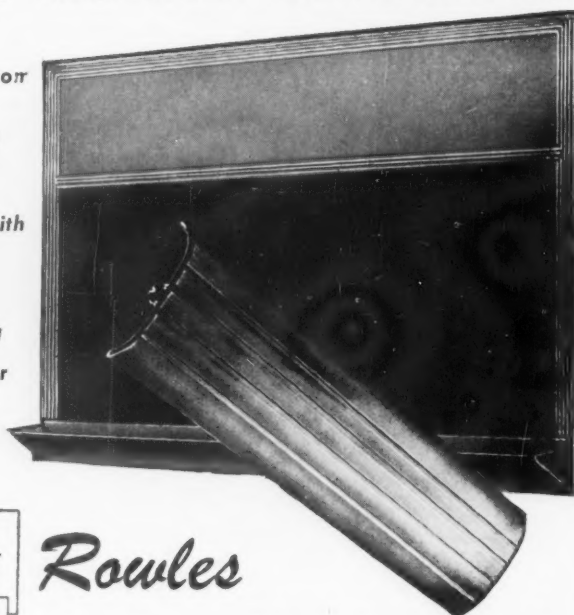
OAK RIDGE, TENN. — L. P. Cushman, superintendent of schools at Owosso, Mich., since 1948, will assume the superintendency of public schools at Oak Ridge, Tenn. on September 15.



Oak Ridge is the "Atomic City" in Tennessee, organized under federal government supervision. Steering com-

# For the MODERN CLASSROOM

- \* Lasting classroom beauty
- \* Easy to install
- \* Economical
- \* Harmonizes with any interior
- \* Fire-safe
- \* Non-tarnishing
- \* Cannot split or crack



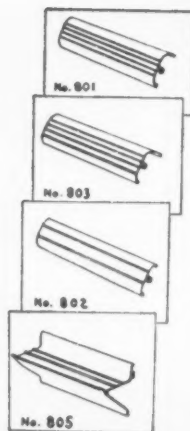
*Rowles*

## Aluminum Chalkboard Trim

The new ROWLES ALUMINUM CHALKBOARD TRIM will help give your classroom a smart, up-to-date appearance at an amazingly low cost. This new line of precision formed extruded aluminum moldings and chalk trough is attractively designed to blend well with any type of interior styling.

Rowles Aluminum Chalkboard Trim is far superior to the less durable types of material. It cannot warp, split, crack, splinter or rot. Above all, it cannot burn. One installation lasts the entire life of your building.

Rowles Aluminum Chalkboard Trim is easy to install. Clip channel is screwed or nailed to rough ground—then snap the molding in place. Corners and joints are easily mitted. No costly fittings to purchase.



**ROWLES**  
School Equipment

WRITE FOR SAMPLES. Additional information, samples and installation details may be obtained from your local Rowles School Equipment Dealer, or by writing direct to

**E. W. A. ROWLES COMPANY ARLINGTON HEIGHTS, ILLINOIS**



# Split-Second SET-UP...

## with RADIANT SCREENS

In just five seconds—yes, only *five* fleeting seconds—you can set up a portable Radiant Tripod Screen. This amazingly easy quick set-up is made possible by Radiant's convenient, no-stoop "touch of the toe" automatic leg lock and other Radiant design features. *AND, this is only one of many* Radiant advantages that have made Radiant the world's largest selling screens.

### From the compact Jiffy to the NEW WIDE screens



There is a Radiant Screen for every projection need, from the Jiffy measuring only 30" x 30" to huge CinemaScope-type screens measuring up to 30 feet. This includes table, tripod, wall and wall-ceiling screens in a wide range of sizes. Send today for the new Radiant Screen Guide, which tells you how to select the type of screens that best fills your needs.



## RADIANT

RADIANT MANUFACTURING CORPORATION, 1208 South Talman Ave., Chicago 8, Ill.

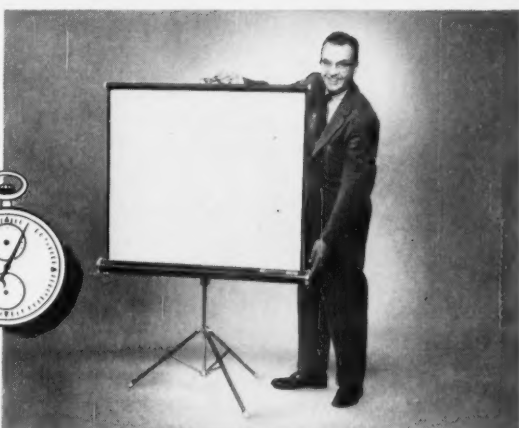


TABLE-DESK  
MODEL SCREEN



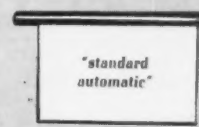
GLASS-BEADED  
TRIPOD SCREEN



LACE &  
GROMMET



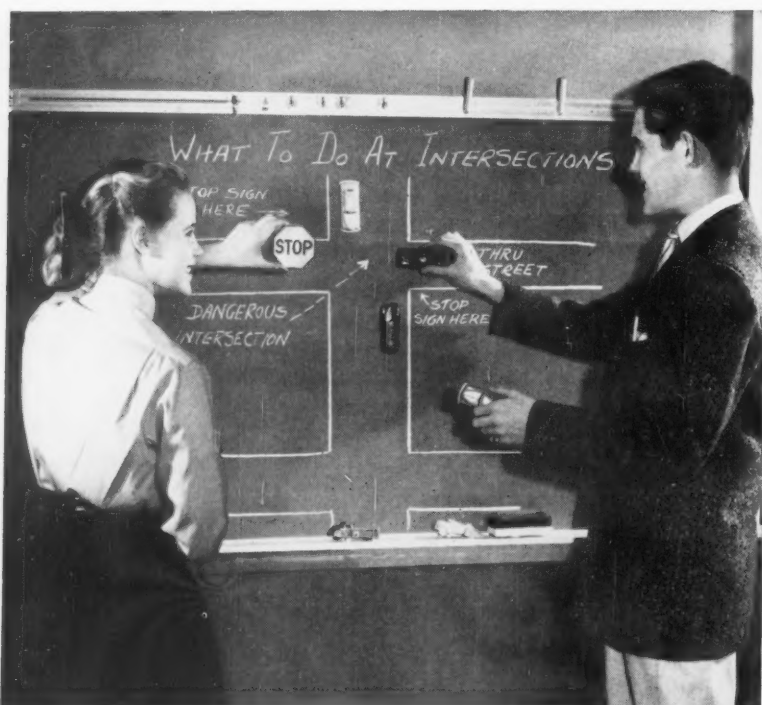
WALL MODEL  
SCREEN



"AUTOMATIC"  
WALL & CEILING

*there is a Radiant Screen for Every need*

Available only from authorized Radiant audio-visual dealers



Students "drive" magnet cars on Weldwood Chalkboard, learn young that safety is no accident. Weldwood Aluminum Chalkboard Trim, shown, makes a neat installation, and installed cost is less than any similar product on the market.

## New magnetic chalkboard helps schools teach highway safety



Another Weldwood product is beautiful Weldwood birch paneling. Built-ins help get away from old-fashioned "institutional" look in Hillendale Elementary School, Montgomery County, Md. Arch.: McLeod and Ferrara.

\*PORCELAIN FACED BY THE BITTINGER CORP.

This new kind of chalkboard lets students see accidents and traffic violations happen right before their eyes. Tiny magnets in toy cars stick to Weldwood Chalkboard, lift instantly to new positions, make it easier to teach safe driving.

Perfect for visual aids in school and business, Weldwood Chalkboard is easy to write on: doesn't "squeal" under chalk. Its soft green color gives maximum readability and is restful to young eyes.

Its porcelain-on-steel\* face is bonded to strong, rigid plywood backed by a sheet of aluminum for balanced construction. Its tough surface won't shatter, warp, break or buckle—and it *never* needs refinishing.

Weldwood Chalkboard is *guaranteed for the life* of the building in which it is installed.

Like to know more? Ask your architect (he'll find specifications in Sweet's) or send coupon. To see Chalkboard and the complete Weldwood line, visit any of our 87 branches in principal cities.

United States Plywood Corporation  
Weldwood Building, 55 West 44th St., New York 36, N. Y.

NS10-541

Please send me Weldwood Chalkboard booklet ☐ and Weldwood Plywood booklet "Commercial Interiors" ☐.

NAME \_\_\_\_\_

ADDRESS \_\_\_\_\_

CITY \_\_\_\_\_

STATE \_\_\_\_\_

**Weldwood®**  
**CHALKBOARD**

A product of  
United States Plywood Corporation  
Weldwood—The Best Known Name in Plywood

mittees of the Atomic Energy Commission and of the Parents Advisory Council are contemplating a change in the school administrative pattern which will make the school system responsible to the local community, and guiding this transition will be one of Mr. Cushman's administrative responsibilities.

Prior to his superintendency in Owosso, Mr. Cushman had held superintendencies in Greenville, Vicksburg, Britton and Perrinton, Mich.

In Owosso, Glen W. Haidt, principal of the high school, has been named to succeed Mr. Cushman as superintendent.

James A. Thomas, who had been acting superintendent at Oak Ridge since the resignation on June 15 of Bertis A. Capehart, will resume his duties as assistant superintendent.

### Russia Challenges U.S. to "Education Race," at Geneva

GENEVA, SWITZERLAND.—More schools, more teachers, and more pupils were reported by delegates of 74 countries at the 19th International Conference on Public Education held here recently.

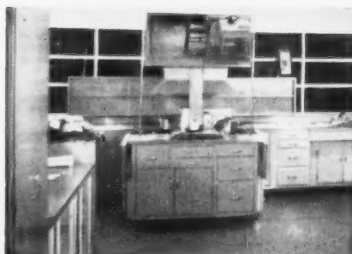
M. Alfred Borel of Switzerland, president of the conference, which was organized jointly by UNESCO and the International Bureau of Education, predicted "an education race which may well be one of the characteristics of our age." Mme. L. B. Doubrovina, deputy minister of education of the Russian Soviet Federated Socialist Republics, on the last day of the conference challenged America to "a competition in the field of education."

Teacher shortages and lack of school buildings hampered millions of children in many countries, delegates learned. The focal points of the conference were school inspection and the teaching of mathematics at the secondary school level.

### Denver Chancellor Criticizes "Manpower and Education"

DENVER. — Teachers must not use their students as pawns to meet the nation's manpower needs, an educator warned recently. Educational effort directed primarily at current labor needs can become sterile and ineffective, asserted Chancellor Chester H. Alter of the University of Denver.

The chancellor criticized the philosophy reflected in "Manpower and Education," recently published report of the Education Policies Commission of



Mobile foods demonstration center, complete with storage and large mirror for easy viewing by class.



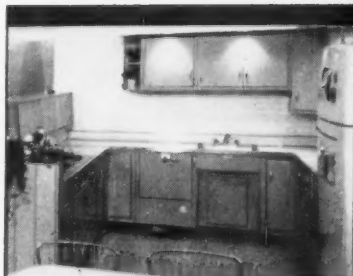
One of several types of sewing machine facilities. This particular one provides space for four students . . . two using machines.

## Mutschler is the "Most"

Junior high to university, schools that install Mutschler departments get the *most advanced planning, most new features, most durable furniture and cabinetwork available*. Complete planning and consultation services cost you nothing extra when your architect specifies Mutschler. And, Mutschler departments lower costs because they are planned for maximum use by students with a minimum of supervision.

General view of an all-purpose homemaking department that includes foods laboratory kitchens, living area, grooming center, sewing area, fitting room, instruction area and completely adequate storage facilities.

**FOR** Foods Laboratory  
Laundry Area  
Arts and Crafts  
Clothing Laboratory  
Sewing Laboratory  
Home Management Area  
Child Care Area  
General Storage Areas



Typical kitchen in foods laboratory. Note that it is planned with the atmosphere and all the conveniences of a modern home kitchen.

### SEND COUPON FOR INFORMATION

If you have a building or remodeling project, call in a Mutschler homemaking department specialist. Let him prove to your satisfaction that you get more for your money with Mutschler!

**MUTSCHLER BROTHERS COMPANY**  
Dept. 1016-I, Nappanee, Indiana

Please send further particulars about your school homemaking services and the name of our nearest Mutschler consultant.

NAME

SCHOOL

ADDRESS

CITY, STATE

Our architect's firm name and address is:

the National Education Association and the American Association of School Administrators. A manpower philosophy of education tends to concentrate on "how" and "what," ignoring the "why" questions about basic values which education must answer, he said.

Addressing summer session graduates at the university, the chancellor said: "I hope that you teachers will not be judged solely on the number of students you turn out who know for sure what careers they want to follow for the rest of their lives, nor

on your ability to place them in a high priority job upon graduation. I would rather you be judged on the quality of men and women who have you to thank for their learning and inspiration, their faith, and their happiness."

("Manpower and Education" was reviewed on page 120 of the September issue.)

### Alabama Has First Statewide Educational TV Network

BIRMINGHAM, ALA.—With the inauguration of a third educational TV

station, Alabama has completed the nation's first statewide and state supported educational TV network. The system beams programs to 90 per cent of the state.

The new station, located at Andalusia, supplements two stations at Birmingham and Munford, which have been on the air since early in 1955. The stations telecast programs simultaneously through microwave relay stations. Programs originate from studios at the University of Alabama, the Alabama Polytechnic Institute, and the Greater Birmingham Area Educational Television Association.

The network is currently programming 45 hours per week, from noon to 9 p.m. each week day. Some 30 hours a week are devoted to live programs.

### 500 U.S., Foreign Teachers to Join in Exchange Program

WASHINGTON, D.C.—More than 500 U.S. and foreign teachers will take part in this year's program of exchange (foreign teaching or seminar study) arranged by the U.S. Office of Education.

Countries participating in the program, besides the United States, are Australia, Austria, Belgium, Canada, France, Germany, Great Britain, Italy, The Netherlands, New Zealand, and Norway. Summer seminars are being conducted in France, Germany and Italy.

American teachers on one-way teaching assignments will go to Austria, Burma, Cambodia, Denmark, Finland, Germany, Greece, India, Indonesia, Iraq, Italy, Japan, Morocco, The Netherlands, Syria, Thailand, Turkey and the colonial areas of the United Kingdom.

### Teachers Urged to Apply for Fulbright Fellowships

NEW YORK.—Teachers in secondary and elementary schools have been urged to apply for U.S. Government fellowships for graduate study abroad. Kenneth Holland, president of the Institute of International Education, who announced the opening of the competition for the Fulbright awards, emphasized the opportunities that the grants give for study or research in various parts of the world.

To be eligible for the foreign study fellowships, which cover transportation, tuition, books and maintenance for one academic year, teachers must have U.S. citizenship, a college degree or its equivalent, a knowledge of the

# IF...

## you are planning a new School Science Department

### ...if you are broadening the activities of your present department

... these booklets can be of help to you. They contain carefully detailed lists of instruments, apparatus and supplies needed for a great variety of demonstrations and experiments in science courses. These lists are based on standard requirements and have been prepared by men long experienced in planning and equipping school science departments.

### THEY'RE FREE!

Write us today giving the name of each pamphlet desired. We'll send them promptly without cost or obligation.

- ☐ Pamphlet ES-3  
"Suggested List of Apparatus and Materials for Elementary Science."
- ☐ Pamphlet GS-5  
"Laboratory Apparatus for General Science."
- ☐ Pamphlet B 8R  
"Laboratory and Demonstration Equipment for Secondary School Biology."

- ☐ Pamphlet HSC-6  
"Secondary School Chemistry List. (Including semi-micro apparatus)"
- ☐ Pamphlet P-10  
"Secondary School Physics List."
- ☐ Cence Order Book  
Lists 1500 items for Science, Biology, Chemistry and Physics.



### Central Scientific Company

1716 IRVING PARK ROAD, CHICAGO 13, ILLINOIS  
BRANCHES AND OFFICES—CHICAGO • NEWARK • BOSTON • BIRMINGHAM • DETROIT  
SANTA CLARA • LOS ANGELES • REFINERY SUPPLY COMPANY—TULSA • HOUSTON  
CENTRAL SCIENTIFIC CO. OF CANADA, LTD.—TORONTO • MONTREAL • VANCOUVER • OTTAWA





From his desk, Dr. J. C. Witter, Superintendent of Schools, Caney, Kansas, is in instant two-way conversation with teachers.



Teacher saves steps; she answers calls from any point in room. Call from principal is announced by bright red privacy light. Teacher can also call principal.



Portable amplifier and loudspeakers provide P.A. facilities for the auditorium, gym and athletic field . . . including announcements to spectators.

**For schools with low-budget problems**

## Executone provides complete communications, classroom privacy

Caney, Kansas, schools get all the many features of expensive console sound systems with simplified, low-cost Executone intercom. This inexpensive, all-purpose system saves time and energy for teachers and principal, increases administrative efficiency. Schoolwide announcements can be made from the principal's desk. School programs, recorded music, speeches, special events, emergency dismissals, every form of sound system transmission can reach all school areas, as well as individual classrooms.

### You get these plus advantages with Executone:

- **Lower Cost**—Expensive console features now possible with new simplified wiring circuit.
- **Easy to Operate**—No complicated, confusing control panels.
- **Easily Installed** in existing schools. In new construction, additional savings possible on wiring.
- **Small Initial Investment**—Starting with intercom, schools can add sound system features as required.
- **Space Saving**—Principal's compact control station needs only small fraction of space required by console.

**More time for teaching!** Teachers like the system. It saves them steps, time and energy . . . so students benefit, too! Find out what Caney schools have learned . . . how Executone School Intercom can improve *your* school administration. Just send coupon for more information.

# Executone

### SCHOOL COMMUNICATION SYSTEMS

*Manufacturers of School-to-Home telephone equipment for shut-ins*

EXECUTONE, INC., Dept. N-12  
415 Lexington Ave., New York 17, N. Y.

Without obligation please send:

- ☐ Complete details on Caney Schools' communication set-up
- ☐ Other free descriptive literature.
- ☐ Name of local representative.

Name \_\_\_\_\_  
School \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_ Zone \_\_\_\_\_ State \_\_\_\_\_

*In Canada—331 Bartlett Ave., Toronto*

language of the country selected, and good health. Preference is given to candidates not more than 35 years of age.

### Newark Schools Earmark \$15 Million for Construction

NEWARK, N.J.—Reorganization and construction are the highlights of an extensive program announced here last month by public school officials. In an effort to fight the threat of overcrowding in the city's elementary and secondary schools, the board of education has redistricted areas, adopted the

6-3-3 plan of organization, and set up a \$15 million building project.

Two problems are facing the schools here, Edward F. Kennelly, superintendent, said. The first is the teacher shortage, and the second is the uneven distribution of population throughout school districts. Officials are attempting to solve this problem by the school revision program.

### Catholic Schools to Push Civics Club Program

WASHINGTON, D.C.—The parochial schools of the Roman Catholic Church

in various dioceses of the United States are being urged to start civics clubs in this year of the presidential election.

The 1956-57 study theme of the clubs is "It's Your Government." The purpose is to "aid in filling the growing need for Christian men and women to participate actively in local and national government," declared the Rt. Rev. Msgr. Daniel F. Cunningham, archdiocesan superintendent in Chicago.

The civics club program is sponsored by the Commission on American Citizenship of the Catholic University of America.

### Texas Gives Summer Work to Gifted Chemistry Students

AUSTIN, TEX.—An experimental five weeks' summer program for high school juniors who had shown aptitude and enthusiasm for science was declared so successful here that the University of Texas probably will repeat the course next summer and add courses in biology, mathematics and perhaps geology.

Standardized tests showed the students' knowledge of chemistry increased 18 per cent during the five weeks, ranking them 12 per cent higher than the average student who has completed a year of college chemistry.

### To Launch Project for Statue of Liberty Museum

NEW YORK.—A national public appeal for \$5 million to establish the American Museum of Immigration at the foot of the Statue of Liberty will be launched on the occasion of that venerable lady's 70th birthday anniversary October 28.

More than 10,000 school children across the nation have already contributed \$1500 to the project, entitled "Operation Unity." The museum, as planned, will record the contributions of immigration to the American culture and heritage, stressing the theme of unity in diversity.

### Harold Spears Is U. S. Member of UNESCO Curriculum Group

SAN FRANCISCO.—Harold Spears, superintendent of schools here, was recently appointed U.S. representative to the UNESCO International Advisory Committee on the School Curriculum. The first meeting of the group, concerned with giving technical assistance in the field of curriculum improvement to member nations, was held September 17 to 29, in Paris. Dr. Spears is the



**Folding Tables are NOT all alike!**

**No other tables have as many "Extra Features" as**

**Mitchell**  
**FOLD-O-LEG**  
**tables**

- ★ GREATER SEATING CAPACITY
- ★ MORE LEG COMFORT
- ★ UNEQUALED APPEARANCE, DURABILITY, STRENGTH
- ★ FINEST CONSTRUCTION, MATERIALS, FINISHES
- ★ BUILT FOR LONG SERVICE

*The Strongest,  
Handiest Folding  
Table Made!*

**TUBULAR STEEL FOLDING LEGS**  **FOLD UNDER FOR STORAGE**

**QUICK, EASY SET-UP ★ FOR CHANGING ROOM USES**

**ANY SIZE STAGE IN ANY ROOM OR HALL, ANYTIME**



**Mitchell PORTABLE FOLDING STANDS**

- ★ Each unit a SAFE stand in itself
- ★ 4'x8'x3/4" Tops, 8" 16" 24" 32" heights
- ★ Strong, rigid TUBULAR STEEL LEGS

*Write for Descriptive Folder*

**MITCHELL MFG. CO.**  
2734 S. 34th St. • Milwaukee 46, Wis.



**1, 2, 3, 4 LEVEL BANDSTANDS**

"U" shaped set-up for BANDS and ORCHESTRAS allow unobstructed vision of musicians, director and audience. Improve appearance, discipline and director control. Same units set-up in a straight line can be used as stepped-up audience seating risers.



**1-LEVEL PLATFORMS, STAGES**

For speakers, raised speakers tables, ceremonies, acts, style shows. Quick set-up or removal. Used in Schools, Colleges, Churches, Hotels, Clubs, Lodges. Each unit only 2 1/2" thick when folded. Store in small space.

**USE THE SAME UNITS FOR MANY DIFFERENT ARRANGEMENTS**

**MFRS. of MITCHELL FOLD-O-LEG TABLES, BAND AND CHORAL STANDS, SEATING RISERS**

## Allendale School, West Seneca, New York

Architect: Pfohl & Stall, Buffalo, N. Y.

Acoustical Contractor: Hudson Plastering Co.

Acoustical Material: Armstrong Minatone



## Noise-quieting ceiling helps youngsters concentrate

Youngsters at the new Allendale School in West Seneca, New York, learn their 3 R's in quiet, friendly surroundings. Here, sound-conditioning ceilings of Armstrong Minatone hush the noise of classroom activities, give coloring, Columbus, and arithmetic a better chance. From recitation to recess, attractive Minatone ceilings make this busy school a more pleasant place in which to teach and learn.

Minatone is an exceptionally efficient acoustical material. It soaks up as much as 90% of the noise that strikes its surface, keeping classroom noises from building into disturbing proportions.

**Completely fire safe . . .** Made of incombustible mineral fibers, Minatone will not ignite or aid the spread of flame.

**Smartly styled . . .** Minatone has a beautiful random pattern of perforations that creates today's smartest ceiling effect.

**Easy to keep clean . . .** Only standard, economical maintenance is required to keep

Minatone's white paint finish as bright as new. Cleaning or repainting will not reduce the material's acoustical efficiency.

**Exceptionally durable . . .** A rugged material, Minatone makes a permanently beautiful ceiling . . . will not warp, chip, peel, or blister.

**Free booklet, "Quiet at Work,"** shows how Minatone and the full line of Armstrong sound-conditioning materials can work for you by increasing comfort and efficiency. For your copy, see your Armstrong Acoustical Contractor or write Armstrong Cork Company, 4210 Wabank Avenue, Lancaster, Penna.



## Armstrong

### ACOUSTICAL MATERIALS

Cushiontone® • Travertone® • Crestone® • Minatone®  
Arrestone® • Corkoustic® • Perforated Asbestos Board

\*TRADE-MARK

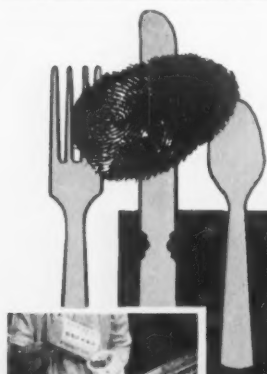
## Buying Bleachers? Better Look Twice at Construction Details

If you're seeking bids on bleacher seating, factors of **safety** and **long-life** should be your prime consideration. So . . . let's compare basic construction details.

Many conventional bleachers being marketed today are fabricated from steel of  $\frac{3}{16}$ " thickness. When exposed to the elements and improperly maintained, pit rust can reach a depth on all surfaces of  $\frac{1}{32}$ " within a year. That means a remaining supporting strength of but  $\frac{1}{16}$ " . . . definitely insufficient for reasonable **safety** and **long-life**.

The load-supporting members of **PLAYTIME** bleachers are one-piece, all-welded steel "Uni-Frame" panels, fabricated from  $\frac{1}{4}$ " structural angular steel with all joints electro-welded on the top and two side surfaces. Allowing for the same rust factor, the remaining supporting strength is  $\frac{3}{16}$ " . . . a sufficient thickness to meet any existing safety code.

Comparisons such as this are definite indications that **PLAYTIME** is your key to the best in athletic field seating. For design, construction, adaptability, economy and safety, **PLAYTIME** seating knows no peer. Let us prove it to you!



one fingerprint  
can contaminate  
your silver!

**the STERIL-SIL  
SILVER HANDLING  
SYSTEM**

keeps bacteria count  
at a minimum!

With Steril-Sil Silver Handling System the utensils are not touched from rinsing to dispensing. Only handles are exposed. Nothing touches business end of utensils after sterilizing. The Steril-Sil System is economical, low in cost and an attractive addition to every feeding operation. Used and recommended by thousands of establishments throughout the country for sanitation and efficiency.

Silver is washed in upright position in Cylinders and tumbled into empty Cylinders handles up. Silver is then carried in convenient Baskets to replace empty Cylinders in Tap Counter or Under-Bar Dispensers.

Steril-Sil Systems are available for every type of operation. Write today.

**the STERIL-SIL company**  
150 CAUSEWAY ST., BOSTON 14, MASS.

author of a number of books in the field of curriculum and instruction and is a member of the editorial advisory board of The NATION'S SCHOOLS.

### Back-to-School Drive Stresses Economic Gains

WASHINGTON, D.C. — Nobody knows how many high school students who returned to school this month did so because of a national back-to-school drive sponsored jointly by H.E.W. and the U.S. Department of Labor.

A fact sheet used by radio and TV announcers, newspaper columnists, local schoolmen, and others put the appeal for high school diploma status chiefly on increased earning power.

"In a lifetime," the wavering school youths were told, "you'll earn from \$30,000 to \$50,000 more if you finish high school." In fact, the senior year adds \$466 to a man's annual income.

Young people were told that a high school education is essential to get a job in any of today's 71 occupations in which there are shortages.

### Plan for Better Integration, Education of Racial Groups

NEW YORK. — A master plan to promote better integration of Puerto Rican and Negro pupils in city schools is being mapped by the board of education.

According to Arthur Levitt, state controller and former president of the board of education, "the plan will set a pattern for desegregating schools that will serve as a model for the whole nation."

Stimulus for the plan came from a study made at the request of the board by the Public Education Association last year. The study revealed that Negro and Puerto Rican pupils generally did not have the same educational opportunities as white pupils. It showed that school segregation existed in fact, but not by intention or law, in neighborhoods where these ethnic groups were strongly concentrated.

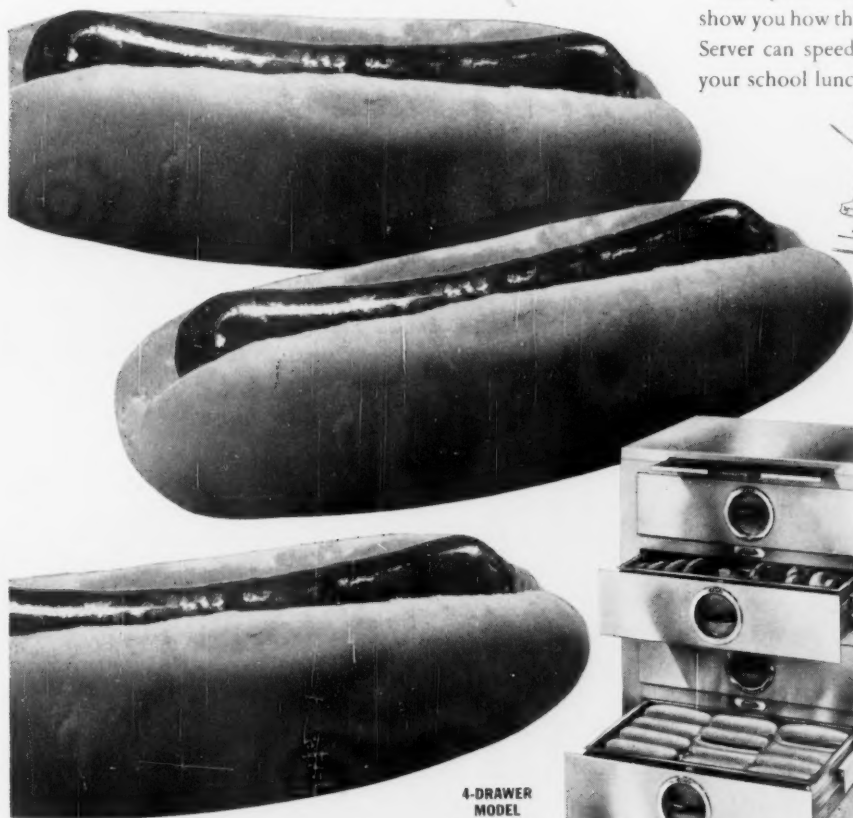
Subcommittees of the board's commission on integration set up to study the problem as a basis for planning have made the following recommendations:

A report of the physical plant subcommittee noted that new zoning of school districts would help to change the make-up of schools which reflect the composition of the neighborhoods in which they are located. The report suggested, however, that

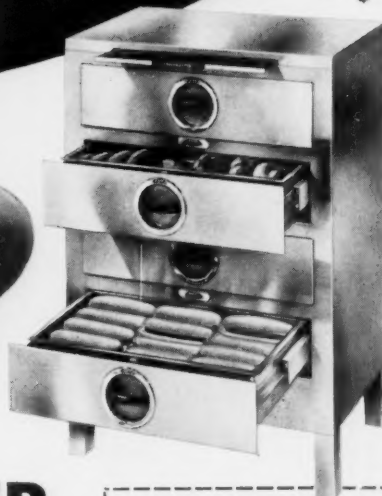


# Have HOT SANDWICHES READY-TO-GO

*for the lunch-hour rush!*



4-DRAWER  
MODEL  
\$445.00†



2-DRAWER  
MODEL  
\$290.00†



3-DRAWER  
MODEL  
\$385.00†



## The New TOASTMASTER HOT-FOOD SERVER

\*"TOASTMASTER" is a registered trademark of McGraw Electric Company, makers of Toastmaster Toasters, Toastmaster Waffle Bakers, Toastmaster Hot-Food Servers, and other Toastmaster Products. Copr. 1955, TOASTMASTER PRODUCTS DIVISION, McGraw Electric Company, Elgin, Illinois.

### AMERICA'S FINEST FOOD SERVICE EQUIPMENT



Waffle Bakers



Bun Toasters



Bread Toasters



Hot-Food Servers

†Prices slightly higher in Pacific coast states

Hot dogs, hamburgers, and a variety of hot foods can be prepared in advance and placed in Toastmaster Hot-Food Servers for *quick* and *easy* service.

Thanks to exacting humidity and thermostatic control, hot sandwiches and other cooked foods stay appetizingly fresh and delicious for hours! Gleaming stainless steel exterior and drawers provide the ultimate in food sanitation. Drawers glide all the way open for access to food. Close silently and securely at the touch of a finger.

No installation expense—operates on standard 115 volt. Just plug it in wherever you need a handy food station.

Ask your food service equipment dealer to show you how the new "Toastmaster"® Hot-Food Server can speed service and end food waste in your school lunch operation.

### TELL ME MORE!

TOASTMASTER PRODUCTS DIVISION  
McGraw Electric Company, Elgin, Illinois

Please send more details about Toastmaster Hot-Food Servers.

My Name.....

School Name.....

Address.....

City..... Zone..... State.....

My Dealer's Name.....

the board of education work with various city and governmental planning agencies to establish integrated neighborhoods which would support integrated schools.

The subcommittee also stated that equal per pupil expenditure for building maintenance among white and Negro pupils would not be sufficient to provide equal and adequate facilities in schools with minority concentrations.

Serious shortcomings in schools in underprivileged areas were reported by the subcommittee on educational

standards and curriculums. Standards were lower in these areas, the report said, but it pointed out that differences in intellectual ability between racial groups must be understood in terms of the known differences in environmental opportunity and stimulation. The schools must provide enriched programs to minimize the effects of environmental deprivation.

This subcommittee specifically called for better teaching, smaller classes, enriched curriculums, and the assignment of more regular teachers to underprivileged areas to replace the

disproportionate number of substitutes. It criticized the practice found in some schools of "watering down" curriculum standards, thereby further weakening the education of deprived pupils. Every effort should be made to help these pupils achieve their maximum potentials, the report said.

The guidance subcommittee urged early identification of gifted pupils and the establishment of a demonstration project to stimulate able students from low status socio-economic homes to attend college. An increase in counseling and guidance service was also recommended.

The library trend emphasized in New Life library furniture

is functional elegance. Never satisfied with merely fulfilling basic requirements for sturdiness in materials and construction, New Life

goes further . . . adding the elegant touch.

Therefore, in setting the pace in library trends, New Life always means better library styling.

Some of the latest library pieces are exclusive, available only at Sjöström of Philadelphia, but literature describing them will be sent to you at your request.

THE ELEGANT TOUCH...



JOHN E. SJÖSTRÖM COMPANY, INC. • 1717 N. TENTH ST. • PHILADELPHIA 22, PA.



### Industry to Offer "Extras" for Teachers at Newton, Iowa

NEWTON, IOWA.—Convention expenses and scholarships for travel and study will be among special benefits for which public school teachers here can qualify next year. A new program of "extras" designed to make teaching in Newton more attractive has been initiated and underwritten by a local industry, the Maytag Company, through the Maytag Foundation, Inc.

The program was developed in cooperation with E. T. Peterson, dean of the school of education, State University of Iowa, and local school officials. Recipients will be chosen by a committee of teachers and school administrative officers.

Under the program, five travel scholarships of \$200 each, two summer school scholarships of \$300 each, and four convention grants of from \$100 to \$300 will be provided. In addition, the foundation will make \$600 available to bring two outstanding specialists in education to Newton for professional meetings with the staff. Each teacher will also receive two tickets for a cultural event of her choice sometime during the year. A "Distinguished Teacher of the Year" award, which includes a lifetime membership in a professional teachers organization, will also be instituted.

### Dynamite Causes Explosion in Partially Completed School

GOLDEN CITY, MO.—A partially completed high school here was damaged last month by an explosion, presumably dynamite, which shattered two walls of the one-story structure. The city marshal said the explosion was caused by "a large charge of dynamite, probably a case" and called it the work of a saboteur. No one was injured in the blast.



*I, too, know why  
a child will use  
an adult  
Encyclopedia!*

As a superintendent of schools, I agree with the teacher who, like the librarian, says:

"I've learned how to make a child an eager user of the basic reference work. I've learned how to help his growing mind, his inquisitive spirit.

"It's done by giving him a chance to become an exceptional adult. It's done by giving him The Americana when he comes in for a fact. For, when we give him The Americana, we are saying in effect, 'We acknowledge your rapid approach to maturity. We know that

you will rise to the challenge of a readable, grown-up encyclopedia.'

"The growing child knows and respects quality. And he respects us for guiding him to a fine, thorough, mature encyclopedia that—though it is written in clear language—does not talk down to him. Finally, having been guided to The Americana, having had the remarkable cross-index in its 30th volume pointed out to him, all of his exceptional qualities respond to the opportunity to dig into his subject. I know. I've seen it happen time and time again."

★  
**THE NEW 1956  
AMERICANA**  
30 volumes

25,500 pages  
60,000 articles  
10,000 illustrations  
44,000 cross references  
300,000 index entries  
21,000 pages  
completely revised  
(1950-1956)

★



*The Encyclopedia*

**AMERICANA**

*The International Reference Work*

..... 2 West 45th Street, New York 36, N. Y.

© Americana Corporation, 1956

Vol. 58, No. 4, October 1956

145



## Just compare the new Stromberg Electronic Time System . . .

Here are some  
(just a few)  
of the many  
PLUS features

- Jewelled Master Clock movement with automatically wound 72-hour spring power reserve.
- Secondary Clocks standard with hourly and 12-hour supervision — correction cycles completed in 60 seconds.
- Program Unit, capable of 1440 signals daily on each circuit, immediately resets following power interruption.
- Manual signals sound instantly on depressing program key.
- Seven-channel transmitter — one for clock supervision, six for program signals.
- Installation and maintenance service available throughout U.S.A. and Canada.

A product of the laboratories of the largest clock manufacturer in the world—YOUR GUARANTEE of performance, quality and dependability.

For complete details, write:

# Stromberg

**TIME CORPORATION**  
Thomaston,  
Connecticut



SUBSIDIARY OF GENERAL TIME CORPORATION

**Brochure of Introduction.** To orient sixth, seventh and eighth graders who moved into a new junior-senior school building at New Hyde Park, N.Y., this fall, the school staff prepared a special pamphlet based on questions raised by the pupils. Maps of the school, the area around it, information about dress, extracurricular activities, class schedules, and the school cafeteria were included.

**Equal Representation Necessary.** Every educated Canadian must have a working knowledge of both French and English, asserted Prof. Maxwell Cohen of McGill University recently. "Canadian culture cannot be simply U.S. culture spilling over the border to become second-rate—it must represent the unity of two systems of thought, two languages, two literatures, and two historical traditions finding in the end a common stream of national consciousness," he said.

**With No Exceptions.** In Big Rapids, Mich., a police department campaign to teach children not to accept rides with strangers really made an impression on Glen Newton, elementary school pupil. When offered a ride home with his school principal, Glen declined. "Oh, no," he said. "My parents and teachers told me never to get in a car with anyone."

**To Complement, Not Compete.** Educational TV is but a complement to what commercial stations can offer, and it will continue to cooperate with them, said David D. Henry, president of the University of Illinois, recently. He pointed out that the educational station has its own unique function: organized, systematic educational service.

**Custom to the Contrary.** "Just because we have always paid our teachers the equivalent or less than industrial workers is no reason to continue doing so; nor is the system of a standardized salary scale regardless of individual merit sacred and unchangeable," asserted William C. Newberg, president of the Dodge Division, Chrysler Corporation. In a recent speech Mr. Newberg urged basic re-evaluation of ways and means of making the teaching profession more attractive.

**Administrators, Too?** Perhaps retirement age should be upped, suggests Dr. Hardin Jones, specialist in medical physics at the University of California. Today, he says, middle-aged Americans are about four years younger physically



# Where do your movies start here...or...here?



Disturbing—that's what it is when those focusing numbers flash across the screen and distract your audience right at the *start*.

But you don't have to begin that way, not with the NEW Kodascope Pageant 16mm Sound Projector.

With the Pageant's NEW single-switch reversing you run a few feet of film to check threading, focus, and sound level. Then you flip the switch and back up to the first title frame. When you're ready to turn off the lights, you *start* with the *opening scene*.

Single-switch reversing also lets you *re-run* important frames for emphasis, a helpful feature with classroom movies.

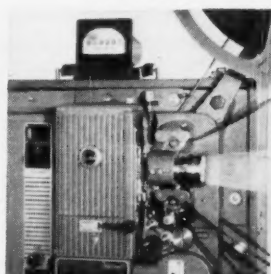
And, this easy reversing is just one of many important advances you'll get with your portable Pageant. It's just one *more* reason why a Pageant takes the "project" out of projection, helps you make the most of every showing.

Your nearby Kodak Audio-Visual Dealer will gladly demonstrate all the Pageant features. Contact him soon.

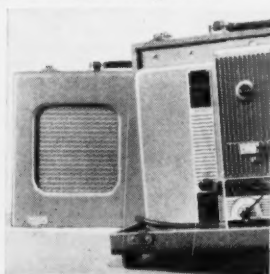
## And ONLY a Pageant gives you:



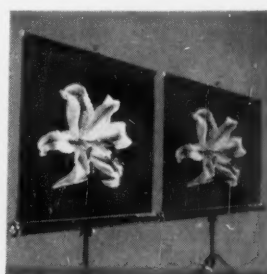
**1. Easy setups**—Folding reel arms, attached belts, and printed film path, to make projection easy even for the inexperienced.



**2. Freedom from worry** over breakdown and maintenance. Your Pageant is lubricated for life, ending the most common cause of projector difficulty.



**3. Superb sound quality**—Tone and volume controls team with well-baffled speaker to give comfortable, true, useful sound for all types of rooms.



**4. Bright screen images**—Super-40 Shutter automatically puts 40% more light than standard shutter on screen at sound speed. Pictures sparkle, even with room lights on.

Choose your Pageant from one of 3 models. And get the facts first. Send for this free booklet giving details. No obligation, of course.



## EASTMAN KODAK COMPANY Dept. 8-V

Rochester 4, N. Y.

10-62

Please send me complete information on the new Kodascope PAGEANT 16mm Sound Projectors, and tell me who can give me a demonstration. I understand I am under no obligation.

NAME \_\_\_\_\_ TITLE \_\_\_\_\_  
ORGANIZATION \_\_\_\_\_  
STREET \_\_\_\_\_  
CITY \_\_\_\_\_ STATE \_\_\_\_\_  
(Zone)

**Kodak**  
TRADE MARK

and have from five to 20 more years of productive early middle life ahead of them than did their forebears of the same age 50 years ago.

**Young Men's Fancy.** Williams College in Massachusetts reports that its students are most interested in advertising, sales, sales promotion, and marketing. Runners up are banking, personnel, industrial relations, and mining.

**Educator Honored.** Robert H. Reid, executive secretary of the N.E.A. committee on international relations, has been awarded an Eisenhower fellow-

ship for a year's study abroad. He plans to examine school systems in 20 countries in Europe, Africa and Asia, with particular interest in the rôle of education in promoting international education.

**Dollar Wise.** Schools at Kalamazoo, Mich., will conduct a pilot project in economic education at all grades levels during the 1956-57 school year. The project is being sponsored by the board of education in cooperation with the Kalamazoo Council on Economic Education and the National Joint Council on Economic Education.

## SHELDON

*Builder of Sheldon Lathes, Milling Machines, Shapers and Sebastian Lathes*

**It only takes  
one good  
Milling Machine  
and a capable  
Shaper to triple  
the value of your  
shop course**



No course in shop practice can be complete without basic instruction on the milling machine and the shaper.

For this no other units equal the size "0" Sheldon Milling Machine with its hand and power table feed, quick-change gear box, variable speed drive, back geared unit, and interchangeable vertical milling head attachment. No other shaper is better suited for class work than the ample size Sheldon 12" Back Geared Shaper with its large capacity, long stroke, variable speed drive, weight and accuracy.

These are standard machine tools with which you can teach modern methods and tool performance—full powered industrial tools that can give your students the "feel" experience and satisfaction of adult work.

Sheldon provides today's modern school shop with "up-to-date" machine tools . . . with 10", 11", and 13" Precision lathes for both industrial arts and vocational programs . . . Sheldon Milling Machines . . . Sheldon Shapers . . . and, for advanced courses, Sebastian 13" and 15" Geared Head Lathes.

### BASIC TEACHING AIDS

In addition to providing conveniently located distributors with experienced sales engineers, Sheldon prepares and publishes basic teaching aids, for shop instructors.

Write for samples today—

**SHELDON MACHINE CO., INC.**  
4266 N. Knox Ave., Chicago 41, Ill.



## ABOUT PEOPLE

### CHANGES IN SUPERINTENDENCIES

**Everett V. O'Rourke** to Belmont, Calif., from the Tahoe-Truckee Unified District, Truckee, Calif. He succeeds **Mae Nesbit**.

**Woodrow W. Zinser** to Avon Lake, Ohio, from Cambridge, Ohio, succeeding **J. I. King**, who is the new supervisor of high schools for Lorain County, Elyria, Ohio. **David J. Shelby**, superintendent at Barnesville, Ohio, succeeds Mr. Zinser at Cambridge.

**Melville O. Johns** to St. Helena Unified School District, St. Helena, Calif., from Nevada County, Nevada City, Calif., succeeding **Harold Hill**, who is the new superintendent of curriculum and personnel, Mount Diablo Unified School District, Concord Calif.

**Clifford Vinton Jones** to Shamokin, Pa., from Port Allegany, Pa., succeeding **J. L. Hackenberg**, who resigned.

**Harry Hatton**, teacher at Delphi, Ind., to superintendent for Carroll County, Delphi, succeeding **J. C. Yunker**, who is the new assistant superintendent for Marion County, Indianapolis.

**Ronald Jenkin** to Benson, Ariz., from Globe, Ariz., where he was principal. Mr. Jenkin succeeds **George A. Rylance**.

**L. A. Ramseyer** to Milliken, Colo., from Weldon Valley Schools, Weldon, Colo. **Leslie S. Hanson**, currently doing vocational rehabilitation work, succeeds Mr. Ramseyer at Weldon.

**Wilford Anderson** to Macksburg, Iowa, from Lanyon, Iowa.

**Elmer Ward** to Lovewell, Kan. He is former director of social welfare for Kiowa County, Greensburg, Kan.

**James T. Coleman** to Kosciusko, Miss. He is former supervisor of teacher education, certification and placement in the Mississippi State Department of Education.

**Rex Deputy** to Green City R-1 Schools, Green City, Mo., from Murray, Iowa, where he was a teacher.

**James Nelson** to Gaines Consolidated School, Gaines, Mich., from Calumet, Mich. He succeeds **Charles E. Hazel**.

**Roscoe Perrine** to Welcome, Minn., from Amboy, Minn., where he was principal.

**C. J. Johnston** to Fort Madison, Iowa, from Bloomfield, Iowa.

**Jack Pennell**, athletic director at Vancleave, Miss., to superintendent there,

# A NEW DIMENSION in lighting fixture value!

Smithcraft school lighting fixtures have always been as easy on the budget as they are easy on the eyes. Smithcraft now adds a new dimension in fixture perfection. The new Smithcraft painting process consists of the finest and most modern Bonderite and Baked Enamel Finish combination in use in the lighting industry today.

In addition to its superior appearance, the new Smithcraft finish has these outstanding qualities:

- Adheres firmly to metal
- Stays white indefinitely without yellowing
- Provides positive resistance to heat and chemicals
- Resists abrasion because of optimum hardness
- Reflects a maximum percentage of light

Because the new Smithcraft finish possesses all these attributes to a greater degree than ordinary finishes, it produces many important new benefits for schools . . . better appearance, better lighting qualities, easier maintenance, and longer, trouble-free life.

*America's finest fluorescent lighting*



Write for the Smithcraft catalog. It can guide you to the finest in new lighting for your school

## *Smithcraft* EYE-Q

two-light, all-steel louvered fixtures.

## *Smithcraft* FEDERAL

two-light, all-steel or plastic-sided louvered fixtures.

## *Smithcraft* MERCURY

two-, three-, or four-light, all-steel louvered fixture.

## *Smithcraft* SHERATON

two- or four-light plastic-sided louvered fixtures.

## *Smithcraft* CHALKBOARDERS

specifically designed for proper illumination of chalkboards, bulletin boards, etc.

# *Smithcraft*

## LIGHTING

CHELSEA 50, MASSACHUSETTS

## WEBER COSTELLO CHALK and ERASERS FOR ALL YOUR CHALKBOARD WORK!

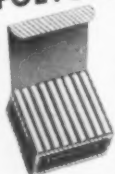
The broadest line of superior quality chalkboard, chalk and erasers, in price ranges to fit your school budget. Make Weber Costello your single source for these important items!

### DOUBLE-SEWED® COSTELLO ERASERS



Buy one, but in EXTRA WEAR you get one more because Costello Erasers are made to withstand years of energetic handling. Molded spring wool felt sections are bound to each other and eraser back by ten separate sewings. They clean thoroughly, pick up and hold erased chalk.

### NEW ALPHASITE POLYCHROMATIC CHALK



Finest quality, dustless chalk designed to reduce eyestrain through restful contrast with chalkboard. Pleasing golden ivory color. Ideal for modern green chalkboard. Regular and triple-size sticks.

### Omega CHALKBOARD CHALK IN COLOR

Omega Chalk creates creativity in chalkboard work. Eight distinctive colors for use on green or black boards. Writes smoothly. Erases easily and completely.

SEND FOR CATALOG GA-55

### WEBER COSTELLO COMPANY

CHICAGO HEIGHTS, ILL.  
Manufacturers of:  
Chalkboard • Chalk  
Erasers • Art Materials  
Maps • Globes

succeeding A. T. Pearce, who has resigned.

Percy Gaalaas to Underwood, Minn., from Bricelyn, Minn., where he was a teacher.

Sherman Gish, high school principal at Greenville, Ky., to superintendent for Muhlenberg County, Greenville. He succeeds Robert Forsythe, who is the new superintendent of Greenville Independent Schools.

Lyle Poyzer to Scranton Consolidated Schools, Scranton, Iowa, from Ocheyedan, Iowa.

Alvin S. Mayoue to Osnabrock, N.D., from Maxbass, N.D., where he was principal.

F. F. Wimberly, principal in Iberia Parish, New Iberia, La., to superintendent there. Mr. Wimberly succeeds Lloyd G. Porter, who has retired.

Edwin E. Prible to Bluffton, Ind., from Huntertown, Ind., where he was principal. He succeeds Lyle R. Willey, who has retired.

Bruce Warner to Blakesburg, Iowa, from Belden, Iowa.

Milton E. Brooks to Isabel, Kan., from Hunter, Okla.

Harold Hintz, principal in the Hanover-Horton District, Hanover, Mich., to superintendent there.

Charles E. Martin, principal at Hazlehurst, Miss., to superintendent there, succeeding Louis B. Megehee.

James E. Bramblett to Albany, Tex., from Rocksprings, Tex.

Franklin B. Walter to Dixie School System, New Lebanon, Ohio, from Johnsville-New Lebanon High School, New Lebanon, where he was principal.

C. A. Sherman to Brentwood Schools, Pittsburgh, from the position of supervising principal of Aspinwall Schools, Pittsburgh. Niles E. Norman, high school principal at Aspinwall, succeeds Dr. Sherman.

Glen Dill to Billings, Okla., from Reydon, Okla., succeeding Dayle Lynch.

James Jones to Cunningham, Tex., from Enloe, Tex., succeeding Floyd Banks.

J. Thomas Walker to Spotsylvania County, Spotsylvania, Va., from Orange Va., where he was high school principal.

E. H. Riehn to Vinton, Iowa, from Stockport, Iowa.

Melvin Lubbers to Whitehall, Mich., from Wyoming Park Schools, Grand Rapids, Mich. (In the September issue,

## FOREST SCHOOL BUILDING

ERECTED 1949

BY  
THE BOARD OF EDUCATION  
TROY OHIO

FRANK C. MONROSE

PRESIDENT

EDW. K. BUTTERFIELD

WILLIAM H. HOBART

LEO H. FAUST

GUY J. FAIRBIE

GLENN B. JEFFERS SUPT. OF SCHOOLS

MARY E. WINNER CLERK-TREAS.

FREEMAN A. FRETZINGER

ARCHITECT

CHARLES H. SHOOK INC.

CONTRACTOR

## BRONZE

MEMORIALS • PORTRAIT TABLETS  
HONOR ROLLS • DONOR PLATES

ORNAMENTAL  
LIGHTING FIXTURES

in Wrought Iron, Bronze and  
Aluminum produced to order.

Illustrated Catalogs  
& Estimates sent on request.



LOOK  
HERE  
FOR  
LIGHTING



← FLUORESCENT  
← INCANDESCENT  
← FLOODLIGHTING  
← COMMERCIAL  
← INDUSTRIAL

This new catalog gives you complete photometric, installation and construction data on one of the industry's most comprehensive lines of lighting fixtures.

District sales offices throughout the country and two centrally located manufacturing and distribution points insure you of experienced assistance and dependable supply.

For your FREE copy of this catalog write to:

ELECTRO SILV-A-KING CORP.

1535 South Paulina St., Chicago 8, Ill.  
Spruce & Waters St., Reading, Pa.







are you making  
**WAXING**  
3 times as hard...

...as it needs to be?



Have you studied your floor maintenance operations and costs lately? Are you satisfied you are getting the best results per hour of labor and dollar of expense? Remember 95c of every floor maintenance dollar is spent for labor. We suggest you call in your nearby Hillyard "Maintaineer"® for a consultation. He will carefully study your floors, floor traffic and special problems, and will recommend in each case: (1) modern streamlined work methods and short cuts; (2) up-to-date labor-saving, dollar-saving tools and equipment; (3) specialized floor treatment products tailored to the particular type of floor and floor use that will cut your labor costs.

*The Hillyard Maintaineer has had years of training and experience in every conceivable type of floor problem. He will gladly put this experience at your disposal, help train your staff. There's no charge, no obligation. He's "On Your Staff, Not Your Payroll."*



ST. JOSEPH, MISSOURI  
SAN JOSE, CALIF.  
PASSAIC, N. J.

## CASE HISTORY — WAXING

### FILE II

Tough, resilient Super Hil-Brite lasts 3 TIMES AS LONG as ordinary floor waxes. Eliminates expensive stripping and refinishing. Cuts labor costs up to 50%. Retains deep, rich lustre even after repeated cleaning — is easier to maintain in top condition.

### SEE IF THE MAINTAINER CAN HELP YOU!

HILLYARD St. Joseph, Mo.

Yes, I'll take you up! Without charge or obligation, have the Hillyard Maintaineer® show me how to take advantage of new streamlined floor treatment procedures.

Name \_\_\_\_\_

Institution \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_

Mr. Lubbers was incorrectly reported as having been superintendent at Grand Rapids.)

**Marion W. Coplen** to Rockport-Ohio Township Schools, Inc., Rockport, Ind., from Claypool, Ind., where he was principal.

**John S. Rinehart** to Niles Township High School, Skokie, Ill., from Perrysburg, Ohio, succeeding **Joseph A. Mason**, who is the new director of the United States Air Force dependents schools in Europe and the Middle East.

**Harold H. Eibling** to Columbus,

Ohio, from Canton, Ohio. Mr. Eibling received a five-year contract at a salary of \$18,000 a year with a \$500 annual increase each year. **John Niererhauser**, Mr. Eibling's assistant, will succeed him in the Canton post.

**Ted L. Crosthwait** to Bardstown, Ky., from Louisville, Ky., where he was director of instructional services.

**Warren B. Crandall** to Hudson Area Schools, Hudson, Mich., from Northwest Jackson Schools, Jackson, Mich.

**Harry E. Kirke** to New Concord-Union Schools, New Concord, Ohio,

from Cambridge, Ohio, where he was principal.

**John J. Shannon** to Belmont County, St. Clairsville, Ohio, from high school principal at St. Clairsville.

**Jerry Moore** to Blanco, Tex. He was formerly principal at Kerrville, Tex.

**John Lyle Hill** to Refugio, Tex., from Kenedy, Tex.

**T. N. Needham**, principal at Eufaula, Okla., to Canadian, Okla. He succeeds **Hugh Baker**, new superintendent at Eufaula.

**Marvin G. Schamber**, teacher at Alexandria, S.D., to superintendent there.

**Paul H. Conner**, assistant superintendent for Potter County, Coudersport, Pa., to superintendent there, succeeding **A. P. Akeley**.

**Clifford Lorah**, principal at Geronimo, Okla., to superintendent there, succeeding **Glen Hastings**.

**Beeman Justice** to Central Heights Schools, Nacogdoches, Tex., from a teaching position at San Augustine, Tex. He succeeds **Lamar Green**, new superintendent at Chireno, Tex.

**Dewey Harvey**, teacher at Boswell, Okla., to superintendent there, succeeding **John W. Jones**.

**Thurston Symer** to Hardin-Houston District, Houston, Ohio, from assistant superintendent there, succeeding **Harold Huston**.

**Edwin E. Plowman** to Hallettsville Independent School District, Hallettsville, Tex., from Flatonia, Tex., succeeding **Rankin Robertson**.

**Roy C. Harrison** to Grand Rapids, Ohio, from Perry Local School, Lima, Ohio. **Charles Crosser**, principal at Perry School, succeeds Mr. Harrison.

**Theodore Trowbridge** to Montpelier, N.D., from a teaching position at Velva, N.D.

**Warren N. Butler** to Metuchen, N.J., from Maywood, N.J.

**James M. Ainsworth** to Brooksville, Miss. He is a former teacher at Northwest Mississippi Junior College, Senatobia.

**Alex Fisher** to Howard Lake, Minn., from Huntley, Minn.

**Benjamin Murrey** to Comstock, Mich., from Bath, Mich.

**Edward Secor** to Knox, Ind., from principal at Windfall, Ind.

**Anthony A. Pupillo**, principal at Plainville, Conn., to superintendent there.

**Dorman R. Ford** to Williamsfield School Unit, Williamsfield, Ill., from

## HOW TO light a gymnasium

Senior High School  
Chambersburg, Pa.



Architect: Lawrie & Green  
Elec. Engr.: Gatter & Diehl  
Elec. Contr.: Keystone Engr. Co.

## teamwork

Important to efficient gymnasium lighting is the teamwork between the architects, engineers, school officials and contractors.

Evaluation of the various functions of the gymnasium area, together with analysis of the levels and quality of illumination required, should precede definite specifications. It's at this point a Pittsburgh representative can suggest the Pittsburgh Perma-flector Fluorescent and Incandescent Equipment that will fill efficiently, and within your budget, all gym lighting needs.

### Planning a Gymnasium?

Write for the idea packed bulletin "How to Light a Gymnasium." It highlights the problems you'll encounter and points the way to their solutions.



## PITTSBURGH REFLECTOR COMPANY

419 OLIVER BUILDING, PITTSBURGH 22, PA.

FLUORESCENT



INCANDESCENT

*Lighting*

REPRESENTATIVES IN PRINCIPAL CITIES • WHOLESALERS EVERYWHERE

In Canada: Pittsburgh Reflector of Canada, Ltd., 105 Tycos Drive, Toronto

*New...For Your Classes in...*

- ✓ CIVICS
- ✓ GOVERNMENT
- ✓ CITIZENSHIP
- ✓ PROBLEMS OF DEMOCRACY

## CITIZENSHIP FOR DEMOCRACY CHARTS

Dimond-Beamer Series of Thirty-Two Charts. Size, 50 x 38 inches. Wide choice of mountings.



Our 1956 Catalog contains complete descriptions and prices for this new series of citizenship charts. Please send for: NS-S56

## Help Students Understand

- America's change from a rural to an industrial economy.
- Benefits of freedom of enterprise.
- Differences between free and totalitarian governments.
- The mechanics of our present-day government and how it functions in our present-day economic structure.
- The significance of such instruments of freedom as the Magna Charta and the Declaration of Independence.



MAPS • GLOBES • CHARTS • MODELS • MAP RAIL

### A. J. NYSTROM & Co.

3333 N. Elston Avenue

CHICAGO 18, Illinois

Warrensburg, Ill., where he was principal.

**Robert Hilburn** to Barstow, Calif. He was formerly superintendent for Lennox District, Lennox, Calif.

**R. E. Baker** to Bentonville, Ark., from Dardanelle, Ark.

**Harold K. Parker** to Butte County, Oroville, Calif. He was assistant professor at Chico State College, Chico, Calif. Dr. Parker succeeds **Jay Partidge**, who has resigned.

**William J. Griffith** to Forest, Ohio, from Haskins, Ohio, succeeding **Frank**

**Blackburn**, who is the new superintendent for Wood County, Bowling Green, Ohio.

**Warren R. Bilben** to Koochiching County, International Falls, Minn., from Hollandale, Minn., where he was supervising principal.

**Victor Wood** to Risingsun, Ohio, from North Baltimore, Ohio, where he was principal.

**Gene Church** to Rosendale School District (R-5), Rosendale, Mo., from Kansas City, Mo., where he was a teacher.

**Dorsey Brause** to Chatfield, Ohio, from Thompson, Ohio, where he was high school principal.

**Gerald Gage**, formerly principal at Fullerton, Neb., to superintendent there.

**William N. McPherson** to Darke County, Greenville, Ohio, from Union-Scioto Centralized School, Chillicothe, Ohio. He succeeds **Carl H. Hendershot**, who will be the assistant superintendent at Bellefontaine, Ohio.

**Charles Strayer** to Orangeville, Ill., from Bement, Ill.

**Earl W. Anderson** to Baudette, Minn., from Howard Lake, Minn.

**Walter Babietzke** to Grey Eagle, Minn., from Edmore, N.D.

**M. M. Pettigrew** to Moberly, Mo., from Boonville, Mo., succeeding **Carl Henderson**, who is the new assistant superintendent at Kirkwood, Mo.

**Toralf Henrikson** to Gwinner, N.D., from Cleveland, N.D.

**Erven Day** to Adams, N.D., from Scranton, N.D.

**Norman F. Jones** to Hicksville, Ohio, from Grand Rapids, Ohio.

**I. Newton Cowan** to Palmyra, N.J., from Hatfield, Pa.

**Obert Berke** to Newburg, N.D., from Braddock, N.D., where he was principal.

**Carl Wheelon** to Waterville, Wash., from Glenwood, Wash.

**Walter E. Wilson** to Manville, N.J., from Metuchen, N.J.

**John Kauffman** to Zap, N.D., from Braddock, N.D., succeeding **Ed Streu**, new superintendent at Hatton, N.D.

**Blanche Pennick**, deputy superintendent for Grays Harbor County, Montesano, Wash., to superintendent there, succeeding **Lota King Wiley**, who died recently.

**Nathan Tubb**, high school principal at Whiteface, Tex., to superintendent there.

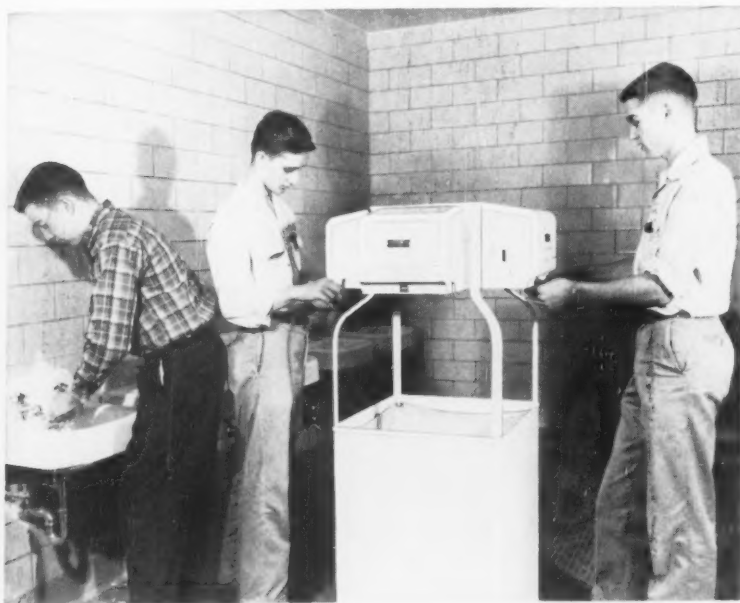
**James Guthrie** to Starkweather, N.D., from Mott, N.D.

**C. Donald Jess**, principal at Bergenfield, N.J., to superintendent there.

**L. M. West** to Tom Bean, Tex., from the position of high school principal at Bells, Tex. He succeeds **G. E. Denny**, new superintendent at Honey Grove, Tex.

**Jacob Klein** to Sykeston, N.D., from Karlsruhe, N.D.

**Charles E. Howard** to Fair Haven, N.J. He was principal of Mendham Township School, Brookside, Ohio.



**Quality of service UP...**

**Costs drop \$200  
with TURN-TOWLS**

A SWITCH to Mosinee Turn-Towls from an ordinary, low-cost per case towel service brought these results for a school system in Michigan with an enrollment of 1,200 pupils:

**TOWEL CONSUMPTION —  
dropped 50%.**

**COST OF TOWEL SERVICE —  
dropped from \$616 to  
\$420 per school year.**

**Write for name of nearest  
distributor**





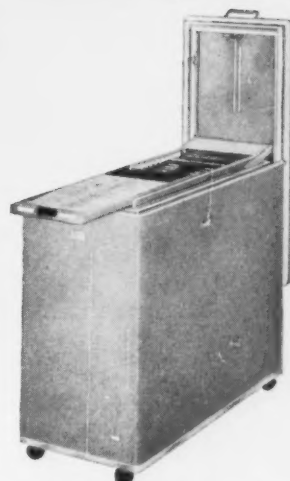
# *This* is a High School



Gone are students, teachers and classrooms. In fact, operation of the physical plant has collapsed. But, the fire that destroyed the physical structure could not touch the school's vital records. Why? Because those records were protected at their point-of-use in Remington Rand certified, insulated equipment.

Within this insulated Mobile Kardex unit vital student history records remained intact...records that will help to implement temporary facilities... maintain the school's program... and, provide the necessary administrative information to continue operations.

Student history records, census records, inventories, and other accessory records, that are the custodial responsibility of school officials, need protection at their point-of-use. Every day 12 schools in the U.S. burn! If fire strikes your school during school hours when vital records are in use (as nearly half of all fires do) would your records survive? How long would your fire last?



Remington Rand Mobile Safe-Kardex Unit saved the vital records of the Hillsboro High School. This is only one of 200 models of **certified** insulated equipment for "point-of-use" 24-hour-a-day record protection.

You can get the answers to these important questions with a Remington Rand SCHOOL RECORDS FIRE HAZARD CALCULATOR. In minutes you'll know whether you have the record protection your school requires, whether you need more and, if so, how much and of what kind.

For free copy, write Remington Rand, Room 2032, 315 Fourth Avenue, New York 10, New York. Ask for Fire Hazard Calculator - SC745 and Booklet "Burning Facts" - SC731.1.



## *Remington Rand*

DIVISION OF SPERRY RAND CORPORATION

George H. McNemar to Washington-Bloomfield School, Iberia, Ohio.

T. Ray Gibbs, Forsyth County, Winston-Salem, N.C., advancing from assistant superintendency.

Frank M. Blackburn to Hardin County, Kenton, Ohio, from Forest, Ohio.

Vaughn E. Rhodes to Bronson, Minn., from Sharon, N.D.

Paul Cochran to Sandy Valley Schools, Magnolia, Ohio, from Bolivar, Ohio, succeeding Charles Porter.

Stuart A. Blackorby to Erskine, Minn., from Calvin, N.D.

George M. Dare, formerly high school principal at Bordentown, N.J., to superintendency there, succeeding Robert M. Oberholser, who has retired.

James Bullard to Granville, N.D., from Buffalo, N.D.

Marvin C. Martin to Stonington Unit District Schools, Stonington, Ill., from Nashville, Ill., where he was principal.

George B. Malony to Gray Consolidated Schools, Gray, Iowa, from Hastings, Iowa.

Harold Ingberg to Hansboro, N.D., from Doyon, N.D. Richard Lee, for-

merly principal at Doyon, succeeds Mr. Ingberg.

#### OTHER APPOINTMENTS

William S. Vincent to associate executive officer of the Institute of Administrative Research of Teachers College, Columbia University. He is a faculty member of the department of educational administration at the college. Mr. Vincent was also named executive secretary of the Metropolitan School Study Council, succeeding Donald H. Ross, the new coordinator of research and special studies in the New York State Department of Education.

Frank Kraus to head of the teacher placement bureau, University of Wyoming. He was superintendent at Cody, Wyo.

Elbie Gann to director of secondary education, Colorado State Department of Education, Denver. He was formerly superintendent at Aspen, Colo.

B. F. Edlund to supervising principal of the Girard Union School District, Girard, Pa., from the position of supervising principal of the Northern Butler County Joint School System, Butler, Pa.

Gilbert Rudiger, principal at Des Plaines, Ill., to assistant superintendent in charge of business there. Leslie Hedberg, formerly curriculum coordinator, is the new assistant superintendent in charge of curriculum.

Stanton W. Simkins to assistant superintendent in Youngstown, Ohio, from the position of director of secondary education at Doylestown, Pa.

Warren Gardiner Hill to commissioner of education for the state of Maine, Augusta. He was chief of the bureau of federal-state-local relations, Connecticut State Department of Education, prior to his new appointment. He served as acting president of New Haven State Teachers College, New Haven, Conn., in 1953-54.

Thomas Clugston to supervising principal of the new Bermudian Joint School District, York Springs, Pa., from the position of administrative assistant to the supervising principal of



William S. Vincent



Warren G. Hill

## THERE IS A DIFFERENCE

SPECIFY SPEAKERS  
PEOPLE CAN HEAR



**Model 847 CDP** for smaller areas,  
12 watts, 16 ohms. Response, 250  
—10,000 cps, crossover at 1500  
cps. Sensitivity rating, 51 db. Size  
11 3/4" x 7 3/4" x 10 1/2". Wt., 6 1/2 lbs.  
List \$46.33.

**Model 848 CDP** for the biggest  
jobs. 25 watts, 16 ohms. Response,  
175—10,000 cps, crossover at  
1000 cps. Sensitivity rating, 52 db.  
Size, 10 1/2" x 20 1/2" x 20". Wt., 12  
lbs. List \$75.00.

Electro-Voice®

CDP®

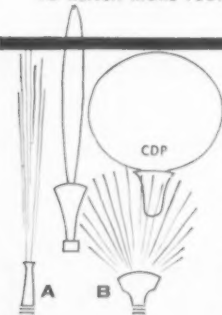
INTELLIGIBILITY and Coverage are what count in public address systems. Power alone won't do the job.

Here's how Electro-Voice CDP's reach more people more clearly: Using a principle developed in the creation of America's finest high-fidelity speakers, two coaxially-mounted diffraction horns work from opposite sides of a single diaphragm over a polar pattern of more than 120° without pin-pointing effect.

Conventional P.A. horns may beam sound volume further, but loudness

—and intelligibility—decreases by 50% just 25 degrees off axis. CDP speakers spread the sound evenly and clearly. Speech is completely intelligible both off axis and on axis (see sketch). Conventional speakers have limited response above 4,000 cps. Yet a range of response to 7,000 cps is required for perception of full articulation. CDP speakers give you 2 1/2 more octaves of sound reproduction in the middle and high ranges and have a frequency response to 10,000 cps—the level required for best reproduction of music.

TO REACH MORE PEOPLE MORE CLEARLY, SPECIFY ELECTRO-VOICE CDP SPEAKERS.

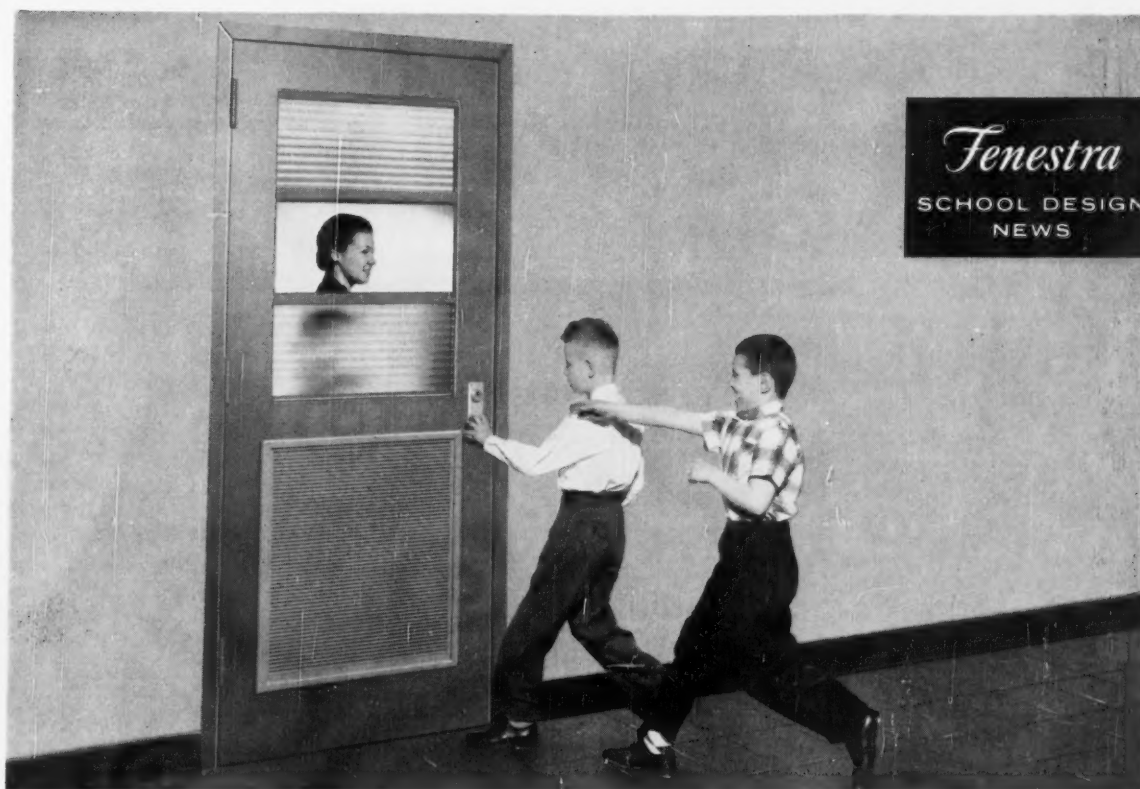


A. This is a garden hose throwing a hard, straight beam, like a conventional P.A. horn. See how it concentrates power but sacrifices coverage.

B. This is a garden hose with a spray nozzle, covering a broad area completely, like an Electro-Voice CDP speaker. See how much more efficient the CDP pattern is.

- CDP speakers are weather-proof, blast-proof and splash-proof, virtually indestructible. They're molded of fiberglass for better acoustical properties and extra strength.
- NAME.....
- COMPANY.....
- ADDRESS.....
- CITY.....ZONE.....STATE.....
- Mail this coupon for Bulletin 195
- Electro-Voice, Inc., Dept. NS 610
- Buchanan, Michigan

**ELECTRO-VOICE, INC.**  
BUCHANAN, MICHIGAN  
Export: 13 East 40th Street, New York 16, U.S.A.  
Cables: ARLAB



*Fenestra*  
SCHOOL DESIGN  
NEWS

Save up to \$100 per door with Fenestra's

## New Fen-Air Louvered School Door

Custom quality at stock door prices with Fenestra Hollow Metal Door-Frame-Hardware Units

Here's a handsome louvered metal door designed for modern schools. It gives complete classroom privacy, *plus* free air circulation to corridors. The perfect door for air-conditioning and forced warm-air heating systems!

Like all Fenestra Doors, the Fen-Air is also designed to save you money—as much as \$100 per door, installed, compared with custom-built louvered doors. Here's why!

First, Fenestra Doors cost less because they are mass-produced to custom-quality specifications.

Next, they cost less to *install* because the door and frame are pre-fitted and machined for all template and surface-mounted hardware. *One man with a screw driver can install it in minutes!* You never have

to cut, fit, mortise, drill or tap a Fenestra Door.

Finally, you save on maintenance year after year because Fenestra Doors can't warp, swell, stick or splinter. They always swing open smoothly and close quietly.

Fen-Air Doors feature the New Fenestra Lock-Miter Joint rolled steel frame, Bonderized, with a baked-on prime-paint coat. High-quality Fenestra hardware and accessories complete the package.

The door illustrated above is glazed with a combination of patterned and clear glass designed especially for school classrooms. The horizontal bars may be removed for installation of a single pane of glass if desired.

Before you choose the doors for your new school building, be sure to call your local Fenestra Representative—listed in the Yellow Pages—for complete information and prices on Fenestra Fen-Air Louvered Door-Frame-Hardware Units or mail the coupon below.

*Fenestra*®  
INCORPORATED

HOLLOW METAL  
DOOR-FRAME-  
HARDWARE UNITS

YOUR SINGLE SOURCE OF SUPPLY FOR DOORS • WINDOWS • BUILDING PANELS

*Fenestra* Incorporated

NS10-3405 Griffin Street, Detroit 11, Michigan

Please send me complete information on the New Fenestra Fen-Air Louvered Door for Schoolrooms.

Name \_\_\_\_\_

School \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_





## true Modularity\*

by FLEETWOOD

\* 2 OR 20 OR 200 WORK TOGETHER PERFECTLY

Did you see our exhibit at Atlantic City? Fleetwood cabinets, sink units, carts, benches, tables and wardrobes offer a new concept in school furniture. Adaptable, versatile and flexible units give better facilities at lower cost, for individual teaching needs,—with strength, durability and beauty. Let our Fleetwood Designers solve your equipment problems.

Write for descriptive literature  
PATENTS PENDING

**FLEETWOOD  
FLEXIBLE  
FURNITURE**

Designed by Henry Glass

Fleetwood Furniture Corporation, Grand Haven, Michigan

## PAGE FENCE

chain link  
America's First Wire Fence—since 1883



• You need a fence if the children lack protection against common hazards. And you certainly want time-tested quality in the safeguard you provide. Whether you choose heavily galvanized Copper-Bearing Steel, corrosion-resisting Aluminum, or long-lasting Stainless Steel, PAGE Fence is quality controlled from raw metal to rugged fence erected on metal posts deep-set in concrete. Available are 8 basic styles, varied by heights, types and sizes of gates, and top rails. Finally, your PAGE Fence will be expertly erected by a reliable, technically trained firm permanently located in your vicinity. For important fence data and name of nearest PAGE firm—

Write to PAGE FENCE ASSOCIATION in Monessen, Pa.,  
Atlanta, Bridgeport, Chicago, Denver, Detroit, Houston, Los Angeles, New York,  
Philadelphia or San Francisco.

PRODUCT OF PAGE STEEL & WIRE DIVISION OF AMERICAN CHAIN & CABLE COMPANY, INC.

Waynesboro Joint School System, Waynesboro, Pa.

W. Eugene Campbell, director of instruction, Norfolk, Va., to assistant superintendent in charge of business and finance there.



Edgar L. Harden

Edgar L. Harden to president of Northern Michigan College, Marquette, Mich. He succeeds Henry A. Tape, who had been president since 1940. Dr.

Harden was dean of continuing education and an associate professor at Michigan State College from 1950 to 1955. He previously had been principal of high schools in Galesburg and Charleston, Ill., and Battle Creek, Mich.

Joseph Robinson to superintendent of welfare education, New York State Department of Education, Albany. He was a teacher at Lynbrook, N.Y.

Charles F. Morris to assistant state supervisor of school transportation for the Florida State Department of Education, Tallahassee. He was superintendent for Santa Rosa County, Milton, Fla.

Dolph Hickman to supervising principal of the California Community School District, California, Pa., succeeding William First. Mr. Hickman was an instructor at California.

George V. Bedison, supervising principal at Leetsdale, Pa., to supervising principal of Quaker Valley Joint Schools, Leetsdale.

Sam M. Lambert to director of the research division of the National Education Association, succeeding Frank W. Hubbard, who was named N.E.A. assistant executive secretary for information services last February. Dr. Lambert joined the staff of the N.E.A. as assistant director of the association's research division in 1950, becoming associate director in 1955. Prior to his work with N.E.A., he was director of research and public relations for the West Virginia Education Association.



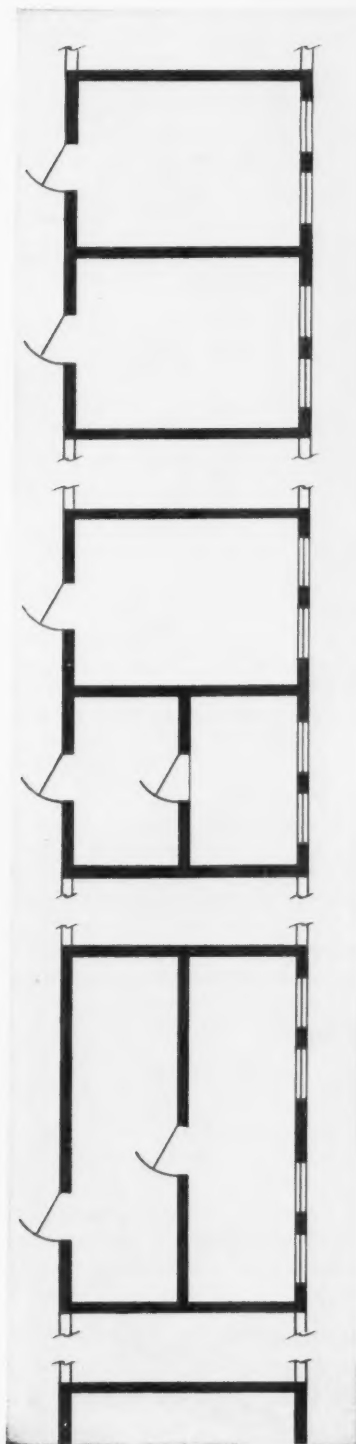
Sam M. Lambert

Robert L. Johnson to supervising principal of Purchase Line Joint Schools, Commodore, Pa., from the position of supervising principal of Greenwood Joint Schools, Millerstown, Pa.

J. C. Witter to the faculty of Northeastern State College, Tahlequah, Okla.



# Classrooms designed for changing times



Fluctuating student census, new teaching methods, different curricula ...all call for changes in classroom requirements. Movable HAUSERMAN Interior Walls offer an extremely efficient means of equipping the modern classroom for all the various activities for which it may be used.

When student population increases, for example, a large classroom can easily be subdivided. HAUSERMAN crews erect a few feet of partition or an entire interior quickly and quietly without the time and mess usually connected with remodeling. Accessories, including chalkboards, tackboards, closets, book shelves and magnetic thumb tacks, enhance the value of HAUSERMAN Walls as vertical teaching surfaces.

Economy of maintenance also can be added to the list of HAUSERMAN advantages. The baked-enamel finish never needs repainting, just periodic washing with mild soap and water.

## HAUSERMAN MOVABLE INTERIORS



**A FREE BROCHURE** entitled "Flexibility in the Co-ordinated Classroom" deals with classroom interior flexibility and its impact on both the psychological and physical environment of the student and the requirements of the community. It also reviews applications of Movable HAUSERMAN Classroom Walls to the problem of long-term school interior flexibility. If you write today, you will receive your free copy shortly.

THE E. F. HAUSERMAN COMPANY  
7479 Grant Avenue, Cleveland, Ohio  
Hauserman of Canada, Ltd., Toronto  
Please send your free brochure to:

Name \_\_\_\_\_  
Title \_\_\_\_\_  
Street \_\_\_\_\_  
City \_\_\_\_\_  
State \_\_\_\_\_

In addition to his teaching duties, Dr. Witter will serve as adviser to graduate students and as the college's representative to high school principals in Oklahoma. He was formerly superintendent at Caney, Kan.

**Thomas C. Armstrong**, high school principal in Wayne Central School District, Ontario, N.Y., to supervising principal of the district, succeeding **L. S. Markham**.

**Herbert Glenn Ludlow** to director of the bureau of appointments, University of Michigan, Ann Arbor. He was associate professor at the university. Dr.

Ludlow succeeds **T. Luther Purdom**, who has started his retirement furlough.

**H. T. James** to associate director of the Midwest Administration Center, University of Chicago. He was assistant director there. Mr. James succeeds **W. W. Savage**, who is the new dean of the University of South Carolina's school of education. **Edward H. Gilbert**, former staff associate at the center, is the new assistant director there.

**Neil O. Woolley** to supervising principal of Madison Central School, Madison, N.Y., from West Leyden Central

School, West Leyden, N.Y., where he was principal. **Lincoln White**, vice principal at West Leyden, succeeds Mr. Woolley.

**Charlotte D. Elmott** to assistant superintendent of instructional services, Santa Barbara, Calif., from director of guidance and secondary education.



Franklin E. Moak

**Franklin E. Moak** to executive officer of the placement office, Teachers College, Columbia University, New York. He was supervisor of the college's international teaching service bureau, and executive counselor of student organizations. Dr. Moak succeeds **Arthur V. Linden**, who has retired.

**Paul V. Petty** to professor and chairman of the department of school administration, University of New Mexico, Albuquerque. He was coordinator of the Arkansas Cooperative Program in Educational Administration and professor at the University of Arkansas.

**Edward A. Carlin** to dean of the Basic College, Michigan State University, East Lansing. He was assistant to the dean there. Dr. Carlin succeeds **Thomas H. Hamilton**.

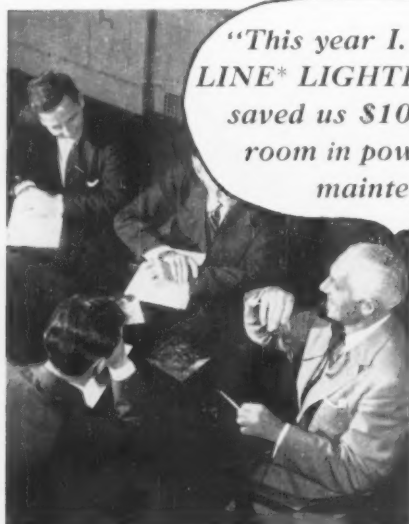
**Alfred Schwartz** to associate professor of education, University of Delaware, Newark, and executive secretary of the Delaware Schools Study Council. He was formerly associate professor of education at Drake University, Des Moines, Iowa.

**Edwin Wallace Davis** to associate secretary of the Commission for the Defense of Democracy Through Education of the National Education Association, Washington, D.C. Dr. Davis will participate in inquiries and investigations conducted by the commission and organize and conduct conferences of educators and lay leaders. He was formerly director of the counseling center, George Washington University, Washington, D.C., and assistant professor of psychology and counselor, University of Illinois at Chicago.

**O. W. Davison** to consultant in secondary education, Los Angeles County, Los Angeles. He was director of the department of school and community services at the University of Oklahoma.

#### RESIGNED

**Clarence Roberts**, superintendent of the Asherton Independent School District, Asherton, Tex.



"This year I. E. C. HAIRPIN-LINE\* LIGHTING FIXTURES saved us \$10.78 per classroom in power costs and maintenance."

#### Typical wherever schools are lighted by HAIRPINLINE\* Cold Cathode fixtures

The \$10.78 annual saving per classroom is the result of a three year check on 1665 classrooms. This substantial saving is due to longer lamp life (Hairpinline Cold Cathode lamps are GUARANTEED for 3 YEARS) and lower current consumption. They supply a glare free, almost shadowless light that more than meets A.S.A. standards. Test made against hot cathode lamps. Savings greater against incandescent lamps.

\*Registered Trademark



Send for fact-filled booklets, name and address of our lighting engineer nearest you.

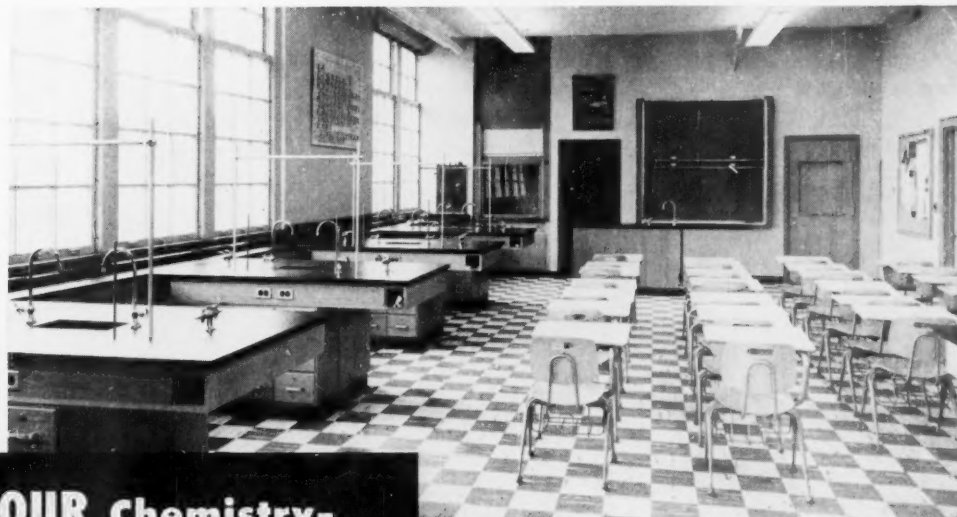


Note lack of shadows under plant. Photo untouched.

#### ILLUMINATING ENGINEERING CO.

2347 E. NINE MILE ROAD, HAZEL PARK, MICHIGAN

# Is Kewaunee "Perimeter Planning" the Answer



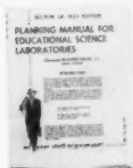
## for YOUR Chemistry- Physics Laboratory?

For many secondary schools, Kewaunee "Perimeter Planning" is the ideal solution to the need for a combination chemistry and physics laboratory. As the Avon Lake (Ohio) High School recently discovered, Kewaunee "Perimeter Planning" offers many advantages:

- Utilizes exterior and end walls for student work tables
- Provides ample tablet-armchair area in center of room
- Allows space for auxiliary demonstration or student project table
- Assures ready access to fume hoods, key cases, storage area
- Permits unusually compact, efficient arrangement
- Takes maximum advantage of window light

This is typical of how Kewaunee's half century of experience in designing, engineering and building finest quality laboratory equipment assures maximum use from minimum space . . . and lower cost per year of service.

Whatever your lab requirements may be, you'll find it pays to consult Kewaunee. Our planning and engineering staff is at your service, without cost or obligation. To get all the facts—without fiction or pressure—call the Kewaunee Man now.



### FREE LABORATORY PLANNING MANUALS

See typical "Perimeter Planning" layouts and other Kewaunee-planned science room layouts. Mail coupon for 48-page Planning Manual and 44-page catalog of advanced Educational Laboratory Equipment.



KEWAUNEE MFG. CO.     TECHNICAL FURNITURE, INC.  
Adrian, Mich.     Statesville, N. C.

REPRESENTATIVES IN PRINCIPAL CITIES



### KEWAUNEE MANUFACTURING CO.

5028 S. Center St., Adrian, Mich.

- ☐ Please send, without cost or obligation, Educational Laboratory Equipment Catalog and Planning Manual.
- ☐ Have your representative call.

Name \_\_\_\_\_

Title \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_

Jack Theeler, superintendent of McLaughlin High School, McLaughlin, S.D.

John R. Miller, superintendent for Henry County, Paris, Tenn., for five years.

Willis Boynton, superintendent for Blue Earth County, Mankato, Minn.

Hugh O. Summers, superintendent of Montrose high schools, Montrose, Colo., for six years.

Leslie W. Scott, director of continuing education at Michigan State University, East Lansing, Mich. He also

served as chairman of the athletic council and was the university's faculty representative to the Big Ten.

Louis Cass, superintendent at Spring Valley, Minn.

George W. Patchell, superintendent at Bentonville, Ark., for three years.

Dwight Sneed, superintendent of Hurricane School, Pontotoc, Miss.

John W. Jones, superintendent at Boswell, Okla., since 1929.

A. M. Anderson, superintendent of Judson School, Longview, Tex., for seven years.

W. W. Robinson, superintendent for Floyd County, Floyd, Va., for three years.

Myrtle Matejka, superintendent for Clay County, Moorhead, Minn., for four years.

Victor Pearson, superintendent at Gobles, Mich., for two years.

#### RETIRED

Harold E. Ryder, superintendent for Lucas County, Toledo, Ohio, for 16 years.

Oscar L. Emerick, superintendent for Loudoun County, Leesburg, Va., effective next year.

William Terry, superintendent of Lovejoy School District, Lovejoy, Ill.

Louis J. Schmerber, superintendent at Paterson, N.J.

#### DIED

Harold S. Irons, 61, retired supervising principal of Sewickley Borough Schools, Sewickley, Pa.

Walton E. White, 47, superintendent at Sugar Land, Tex., for six years.

Willard DeJonge, 47, superintendent at Comstock, Mich., for three years.

Mrs. Clyde Vaughn, superintendent for Oregon County, Alton, Mo., for six years.

Sigel Elza Raines, 94, former superintendent at Freeport, Ill.

Harold P. French, 61, retired superintendent of Third Supervisory District of Albany County, New York.

R. C. Tompkins, 79, former superintendent of the State Colony and Training School, Minden, La.

Stephen Fielding Bayne, 77, retired deputy superintendent in New York City.

John George Althouse, 67, chief director of education for the province of Ontario, Toronto, for 13 years. Dr. Althouse was a past president of the Canadian Education Association and secretary of the Canada and Newfoundland Education Association.

Joseph F. Gonnely, 74, former district superintendent in charge of junior high schools in Chicago for nine years.

Arthur Green, 54, supervising principal of East Huntingdon Township School District, Alverton, Pa., since 1937.

Luke H. Kelly, 55, consultant in agricultural education, office of vocational education, department of public instruction, Lansing, Mich. He was former superintendent at Benzonia, Haslett and Okemos, Mich.

NEW



Bowls are furnished in stainless steel or vitreous enamel, 6" deep. Outside dimensions, 16" x 24". Other fittings such as combination bubbler and faucet can be furnished on special order.

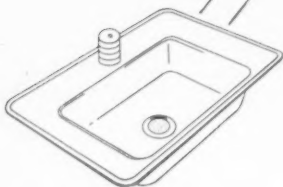
SANITARY

## BRADLEY COUNTER TYPE DRINKING FOUNTAINS

Here are the latest in ultra-sanitary, long-life Counter Type Drinking Fountains—the model shown above equipped with one bubbler and one glass filler faucet. Bowls are full stainless steel with stainless steel mounting rim—easy to keep spotlessly clean with minimum maintenance.

The Bradley line of Drinking Fountains also includes pedestal, single and multiple types. Write for latest specifications to BRADLEY WASHFOUNTAIN CO., 2207 W. Michigan Street, Milwaukee 1, Wisconsin.

Same unit, shown below, furnished as a Wash Fixture, has standard Bradley Sprayhead to supply water for hand washing. Has foot-control of water supply, and bowl is self-flushing to prevent collection of used dirty water.

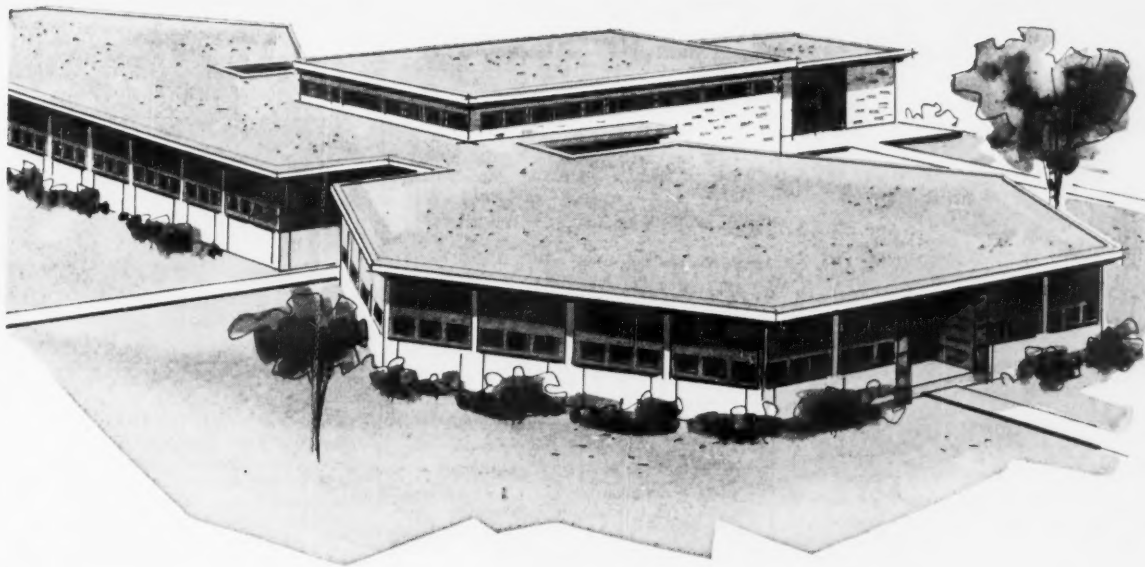


**BRADLEY**  
drinking fountains

See pages 18 and 19 of Catalog 5601.

Distributed Through Plumbing Wholesalers





## A SCHOOL LIKE THIS NEEDN'T BE EXPENSIVE

*Stran-Steel structural systems substantially cut construction costs for 3 new Ohio schools*

This handsome Northeast Elementary School in Findlay, Ohio, only looks expensive. It cost substantially less than traditional types to build, yet it combines prime quality construction with the newest functional design.

How can this be done?

The answer is Stran-Steel's system of fully integrated components. Joists, "C" sections, studs, channels, roof decking and sidewalls are made for each other. But the biggest cost-saver is the nailing groove. Stran-Steel's distinctive nailing groove makes it possible to nail collateral materials directly to the framing without special tools.

This fall three new schools of similar design will provide an additional 50,000 square feet of space for the school children of Mendon and Findlay. An annex to Whittier Elementary School

and an addition to the Mendon-Union Local School, as well as the complete new Northeast Elementary School are of the hexagonal Maximlite design and built with Stran-Steel framing members. Maximlite design achieves maximum use of natural lighting, the most economical and flexible use of space and an attractive appearance inside and out.

Because the Stran-Steel structural system is adaptable to all types of construction, it can be used for complete new schools or an addition to the buildings you already have. With Stran-Steel, you will always have an attractive, durable, fire-safe structure. And design possibilities are limited only by your imagination.

Ask your architect to show you how these structural systems can fit into your school building plans. All Stran-Steel architectural products are available from a dealer near you.



In-construction closeup of Stran-Steel joists and columns.



**STRAN-STEEL CORPORATION**

Detroit 29, Michigan • A Unit of



Stran-Steel Corporation  
Detroit 29, Michigan

Please send full information on Stran-Steel structural systems for schools.

Name

Address

City  Zone  State

56-SS-65A

R

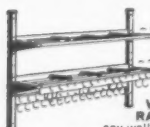


A system of multi-purpose movable steel wardrobe racks with either a chalkboard (blackboard) or a corkboard (bulletin board for pictures, maps, etc.) back. These sturdy, welded furniture steel units provide: (1) Means for holding coats, hats, overshoes and lunch boxes in an efficient and orderly manner; (2) Chalkboards or corkboards to aid class instruction; (3) Efficient, large capacity, space-saving wardrobe units, that go wherever needed, fit any space, and permit complete flexibility in room arrangement.



**NO. CH-400 CHALKROBE**  
42" long, 25" deep, 6 1/2" high on glides (or 6 1/4" high on casters). Hat shelves and hanger bars are adjustable for height—accommodate every age group—(Hold 16 with coat hangers or 24 with coat hooks). Off-floor shelf for overshoes and 50" x 48" chalkboard.

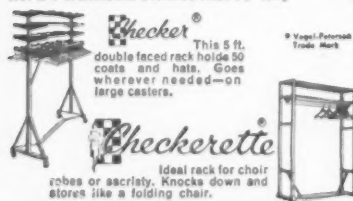
**NO. CO-500 CORKROBE** same as No. CH-400 but with corkboard back.



**WALLMOUNT WARDROBE RACKS**—Mount permanently on any wall. Shelves adjustable for height in 2" steps (accommodate any age group). Hold 4 spaced coat hangers or 8 coat hooks per running foot. Units interlock to make continuous rack of any length.

**No. AW-3 Wallmount Coat and Hat Rack** 3 1/2" long  
**No. AW-4 Wallmount Coat and Hat Rack** 4 1/2" long

**WALLMOUNT OVERSHOE RACKS**—Mount on wall at floor level... extend 11 1/2" out from wall. Interlock to make rack of any length.  
**No. B-3 Wallmount Overshoe Rack** 3 1/2" long  
**No. B-4 Wallmount Overshoe Rack** 4 1/2" long



Write for Bulletin SL-25

**VOGEL-PETERSON CO.**  
1127 West 37th Street • Chicago 9, Illinois

## COMING EVENTS

### OCTOBER

2-5. National Council on Schoolhouse Construction, annual meeting, Washington, D.C.

7-11. Association of School Business Officials of the United States and Canada, 42d annual convention, Washington, D.C.

11, 12. National Organization of Law Professors of Education, second annual convention, Chicago.

14, 15. Texas Association of School Boards, Austin.

14-17. County and Rural Area Superintendents, N.E.A., 11th national conference, Atlanta, Ga.

17-19. Schoolmen's Week, University of Pennsylvania, Philadelphia.

20-26. National Safety Congress, 44th annual session, Chicago.

22-25. American School Food Service Association, 10th annual convention, Chicago.

### NOVEMBER

1-2. 21st Educational Conference, Educational Records Bureau and the American Council on Education, co-sponsors, New York.

7-9. National Association of Public School Adult Educators, fourth annual conference, Atlantic City, N.J.

10-12. Adult Education Association, sixth annual conference, Atlantic City, N.J.

11-15. American Association of Land-Grant Colleges and State Universities, Washington, D.C.

11-17. American Education Week.

12-16. American Public Health Association, 84th annual meeting, Atlantic City, N.J.

13, 14. Ohio School Boards Association, annual meeting, Columbus.

15, 16. Iowa Association of School Boards, Des Moines.

18-20. Illinois Association of School Boards, annual convention, Chicago.

18-20. Northwest Regional Conference on Administrative Leadership Serving Community Schools, jointly sponsored by N.E.A.'s Department of Rural Education and the American Association of School Administrators, Spokane, Wash.

25-28. National School Service Institute, 40th annual convention, Chicago.

29-Dec. 1. New Jersey Association of School Business Officials, Atlantic City, N.J.

### DECEMBER

5-7. National Conference on Exchange of Persons, sponsored by Institute of International Education, Chicago.

### FEBRUARY

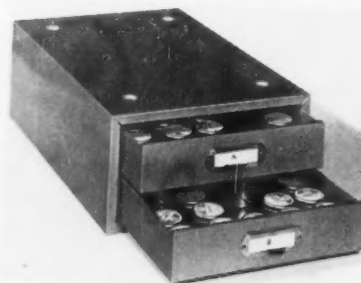
15-20. American Association of School Administrators, Atlantic City, N.J.

16-20. National School Public Relations Association, N.E.A., midwinter meeting, Atlantic City, N.J.

20-22. American Association of Colleges for Teacher Education, N.E.A., annual convention, Chicago.

23-27. National Association of Secondary-School Principals, N.E.A., 41st annual convention, Washington, D.C.

## ... for the Classroom



### 90-filmstrip capacity

The No. 90C Standard Filmstrip Library Plan files and controls filmstrips used in the classroom. Sets on desk. Lock-stacks one on another. Ideas and materials supplied for filing system.

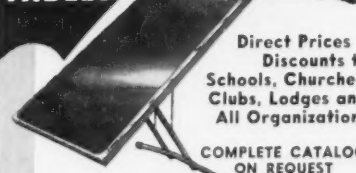
Heavy-gauge steel cabinet, silver-gray finish. Lock-stacks with other sizes. Add to as your library grows.

Many other larger and smaller filmstrip library plans available

### SEE YOUR VISUAL EDUCATION OR SCHOOL SUPPLY DEALER

JACK C. COFFEY CO.  
710 17th St., North Chicago, Ill.

## monroe FOLDING BANQUET TABLES



Direct Prices & Discounts to Schools, Churches, Clubs, Lodges and All Organizations

COMPLETE CATALOG ON REQUEST

### TRUCKS FOR FOLDING TABLES



Monroe TS (transport - storage) Trucks make handling and storing of Folding Tables easy and quick. Combination offers.

### STEEL FOLDING CHAIRS



Monroe Steel Folding Chairs in attractive range of styles, sizes and prices. Excel in comfort, easy handling and durability. Also full line of non-folding chairs, desks and combinations for classroom, cafeteria and church school use.

### PORTABLE PARTITIONS



Monroe's new movable partitions change idle space into useful areas. Smooth Masonite panels, tubular steel frames. Swivel pedestals, casters or glides.

THE Monroe COMPANY  
76 Church St. Colfax, Iowa

# How many classrooms could you use... right away?

## Create Low Cost Classrooms in a few Hours with Modernfold Doors

Call your MODERNFOLD distributor today, and by tomorrow you may have the new classrooms you need! MODERNFOLD doors can be speedily installed to divide your present rooms into a larger number of units and permit you to vary their size, purpose and capacity in just a few seconds.

These sturdy doors fold and unfold like an accordion. Closed, they give you two classrooms in the space of one. Opened, you have a single large room again. Their rugged steel and vinyl construction is almost "student-proof."

And the cost is surprisingly low, when you consider how quickly and easily MODERNFOLD doors can solve so many of your classroom space problems.



MODERNFOLD is mounted on overhead tracks. Doors are available in dozens of colors, any size.



Easily washable MODERNFOLD doors have replaced dust-catching curtains in many auditoriums.

**New Castle Products, Inc., Dept. K54**  
New Castle, Indiana

Please send me full information on MODERNFOLD Doors

NAME \_\_\_\_\_

BUSINESS ADDRESS \_\_\_\_\_

CITY \_\_\_\_\_ ZONE \_\_\_\_\_ STATE \_\_\_\_\_

**modernfold**  
DOORS

MODERNFOLD distributors are listed under "Doors" in city classified telephone directories.

© 1956, NEW CASTLE PRODUCTS, INC.

NEW CASTLE PRODUCTS, INC., New Castle, Indiana • In Canada: New Castle Products, Ltd., Montreal 23 • In Germany: New Castle Products, GMBH, Stuttgart

## THE BOOKSHELF

Printed publications of interest to school administrators are listed as received.

### ADMINISTRATION

**Please Attach Photographs.** The results of a survey on job discrimination against college students because of race, religion or national origin. Anti-Defamation League of B'Nai B'Rith, 515 Madison Ave., New York 22. Pp. 15. 10 cents.

**Teaching Load of Teachers of English in Indiana.** Bulletin of the School of Education, Indiana University. By Ingrid M. Strom. Division of research and field services, Indiana University, Bloomington. Pp. 62. \$1.

### AUDIO-VISUAL

**In-Service Education in Audio-Visual Methods.** A report on activities and re-

sources in Michigan. Edited by Marie McMahon. Michigan Audio-Visual Association, a department of the Michigan Education Association. Pp. 87. \$1.

**Radio and Television Bibliography.** Prepared by Gertrude G. Broderick, radio-TV education specialist, U.S. Office of Education. U.S. Govt. Prtg. Off., Washington 25. D.C. Pp. 46. 25 cents.

### BOARD OF EDUCATION

**Suggestions for Procedure for Missouri Boards of Education.** By W. W. Carpenter and A. G. Capps, professors of education, and L. G. Townsend, dean of the faculty, college of education, University of Mis-

souri. University of Missouri, Room 102, Building T-3, Columbia. Pp. 92. 50 cents.

### BUSINESS ADMINISTRATION

**Association of School Business Officials of the United States and Canada.** Proceedings of 41st annual convention, 1955, in Chicago. Charles W. Foster, executive secretary, 1010 Church St., Evanston, Ill. Pp. 382. \$4.

### CURRICULUM

**Independent Activities for First Grade.** Department of Elementary Education, Minneapolis Public Schools, 807 N.E. Broadway. Pp. 76. \$1.50.

**Labor-Management Relations in the Secondary School Curriculum.** By Walter J. E. Schiebel, principal of N. R. Crozier Technical High School, Dallas, Tex. Texas Study of Secondary Education, 2207 Nolen St., Austin. Pp. 36. 50 cents.

**Maturity in Reading, Its Nature and Appraisal.** By William S. Gray, professor emeritus of education and director of reading research, University of Chicago, and Bernice Rogers, research associate in reading, University of Chicago. University of Chicago Press, Chicago 37. Pp. 373. \$5.

**Problems in Mathematical Education.** By Henry S. Dyer, Robert Kalin and Frederic M. Lord. Educational Testing Service, Princeton, N.J. Pp. 50.

**Reading Readiness in Kindergarten and First Grade.** Minneapolis Public Schools, 807 N.E. Broadway. Pp. 108. \$1.50.

**Social Studies in the Elementary Schools.** Curriculum office, school district of Philadelphia. Board of Public Education Printing Department, Philadelphia. Pp. 191.

**Talk About the Weather.** By Robert Moore Fisher. Birk & Co., Inc., 270 Park Ave., New York. Pp. 15. 12 cents.

**The General Said, "Nuts!"** The story of America as reflected by its favorite slogans. By R. V. Cassill. Birk & Co., Inc., 270 Park Ave., New York. Pp. 16. 12 cents.

### DIRECTORIES

**Education Directory, 1955-1956, Part 2, Counties and Cities.** U.S. Office of Education, U.S. Govt. Prtg. Off., Washington 25. D.C. Pp. 94. 35 cents.

### EDUCATIONAL PSYCHOLOGY

**Children and Other People—Achieving Maturity Through Learning.** By Robert S. Stewart and Arthur D. Workman. Dryden Press, Inc. 31 W. 54th St., New York, Pp. 276. \$2.25.

### ELEMENTARY EDUCATION

**How Firm a Foundation? An appraisal of threats to the quality of elementary education.** By Hollis L. Caswell, president of Teachers College, Columbia University. Harvard University Press, Cambridge, Mass. Pp. 42. \$1.50.

### FINANCE

**The Mutual Security Program, Fiscal Year 1957.** Department of State, Department of Defense, International Cooperation Administration. U.S. Govt. Prtg. Off., Washington 25, D.C. Pp. 82.

### INTERGROUP RELATIONS

**The Status of the Public School Education of Negro and Puerto Rican Children in New York City.** By the Public Education Association, assisted by the New York University Research Center for Human Relations. Public Education Association. 20 W. 40th St., New York. Pp. 24.

THE NATION'S SCHOOLS



## KOHLER PLUMBING FIXTURES

insure

superior service  
and hygiene



Greenwich lavatory

Rockbrook  
drinking fountain



Kenwyn closet

More than 250 Kohler plumbing fixtures, with fittings, were selected for the Janesville, Wisconsin, Senior High School. As in schools across the nation, they were chosen for reliable hygienic protection, easy maintenance and ability to withstand severe school use.

The Greenwich lavatory has a 5-inch back to protect walls, roomy basin, easy-to-use fittings. At the base are cast-in screw-openings for firm anchorage to walls. The Rockbrook drinking fountain has a non-squirting bubbler head, hygienic chromium-plated metal mouth guard. The Kenwyn closet functions reliably, quietly. All three are of vitreous china, with glass-like, easy-to-clean surfaces.

In addition to the fixtures shown, the Janesville School has enameled iron acid-resisting Bannan service sinks and Branham urinals. Send for catalog.

Kohler Co., Kohler, Wisconsin. Established 1873

# KOHLER OF KOHLER

PLUMBING FIXTURES • HEATING EQUIPMENT • ELECTRIC PLANTS  
AIR-COOLED ENGINES • PRECISION CONTROLS





WORLD TRAVEL SERVICE  
TRAVELERS CHEQUES  
MONEY ORDERS  
FOREIGN FREIGHT FORWARDING  
CUSTOM BROKERS  
FIELD WAREHOUSING  
FOREIGN REMITTANCES

**"National Accounting Machines save us more than 100% annually on our investment!"**

— AMERICAN EXPRESS COMPANY, New York

"Our vast network of sales outlets and services requires a high speed, modern accounting system. We estimate that National Accounting Machines save us over 100% on our investment annually.

"National's simplicity reduces operator training to a minimum. The many automatic features promote accuracy, because what machines do automatically, operators cannot do wrong.

"Our operators are pleased because they do their work with less effort and the flexibility of the National enables us to do several different accounting jobs on the same machine."

*R. V. Reed*

President

Your nearby National representative will gladly show how much your business can save with Nationals.

**THE NATIONAL CASH REGISTER COMPANY, DAYTON 9, OHIO**  
989 OFFICES IN 94 COUNTRIES

#### FACTS ABOUT AMERICAN EXPRESS

344 offices in 35 countries.

Over 65,000 other outlets including banks, drug and variety stores, supermarkets, factories, and independent travel agencies.

TRADE MARK REG. U. S. PAT. OFF.

**National**

ACCOUNTING MACHINES

ADDING MACHINES • CASH REGISTERS



## Dependable Locker Guardians

## NATIONAL LOCK Combination Locks



### SHACKLE LOCKS

- Sound engineering
- Sturdy components
- Brass working parts
- Chromium plated shackle
- Stainless steel outer case
- Self-locking
- 3-number dialing
- Available with or without masterkey feature

### BUILT-IN LOCKS

- Rugged construction
- Attractive styling
- Baked enamel dial
- Zinc plated bolt and box
- 3-number dialing
- Self-locking
- Fit all standard lockers
- Available with or without masterkey feature

Master charts for lock records, complete with leatherette binder, are supplied FREE with quantity lock purchases. Write on your letterhead for FREE sample lock.

ASK ABOUT OUR LABORATORY-CABINET LOCKS, TOO.



**NATIONAL LOCK  
COMPANY**  
Rockford, Illinois  
LOCK DIVISION

## Montgomery

### SYNCHRONOUS PROGRAM CLOCKS

automatically operate signals of any school . . . ideal for new or existing systems

low cost . . . easy to install

MODEL 'A-A' MODEL 'M & L'

**NEW! MULTI-CIRCUIT**  
provides complete automatic operation of 1 to 5 separate schedules on 1 to 5 groups of signals. Signals adjust from 2 to 25 seconds. Calendar switch regulates automatic operation. Clock and program mechanism set by turning hands. Special signals, by push-buttons, do not disturb automatic operation. 12 or 24 hour models.

**ONE & TWO CIRCUIT**  
Complete automatic operation of 1 or 2 circuits on pre-arranged schedules. 12 or 24 hour models with 2 to 25 second signals. Regulated by automatic calendar switch. Perfect synchronization; set by turning clock hands. Push buttons for special signals do not disturb automatic operation. Easily installed in new or existing system.

SEE YOUR SCHOOL SUPPLY DISTRIBUTOR OR WRITE FOR DETAILED INFORMATION

**MONTGOMERY MFG. CO. OWENSVILLE, INDIANA**

## SPACEMAKER MATCHED SEATING

Chair Desks  
Tablet Arm Chairs  
All Purpose Chairs



Makes space for several more units per room.



Die stamped steel frames assure long years of satisfactory classroom service. Give scientific posture controlled comfort—the basis for attentive study.

For bulletin and samples ask for  
SPACEMAKER No. 1500

Beckley-Cardy

**BECKLEY-CARDY COMPANY**  
1900 Narragansett • Chicago 39



St. Agnes High School, Rochester, N. Y.  
Architect: Waasdorp & Northrup; Contractor: A. W. Hopeman & Son

## St. Agnes Divides to Conquer Space Problems

Plans for new St. Agnes High School specified one large conference room for student use. But on occasion it had to accommodate two different group activities at once. The architect recommended FOLDOOR. Now, at a touch, FOLDOORS make two rooms of one. Or in seconds, FOLDOORS glide completely out of the way again. Similarly, FOLDOORS gave St. Agnes faculty members their private dining room without lost floor space (see inset). If you build or remodel, consider this flexibility that FOLDOOR offers . . . at such low cost in space and money. There are sizes and fabrics for every situation, plus an option of electric control or hand operation. See your FOLDOOR distributor for details. He's listed under "Doors" in the yellow pages of your telephone directory.

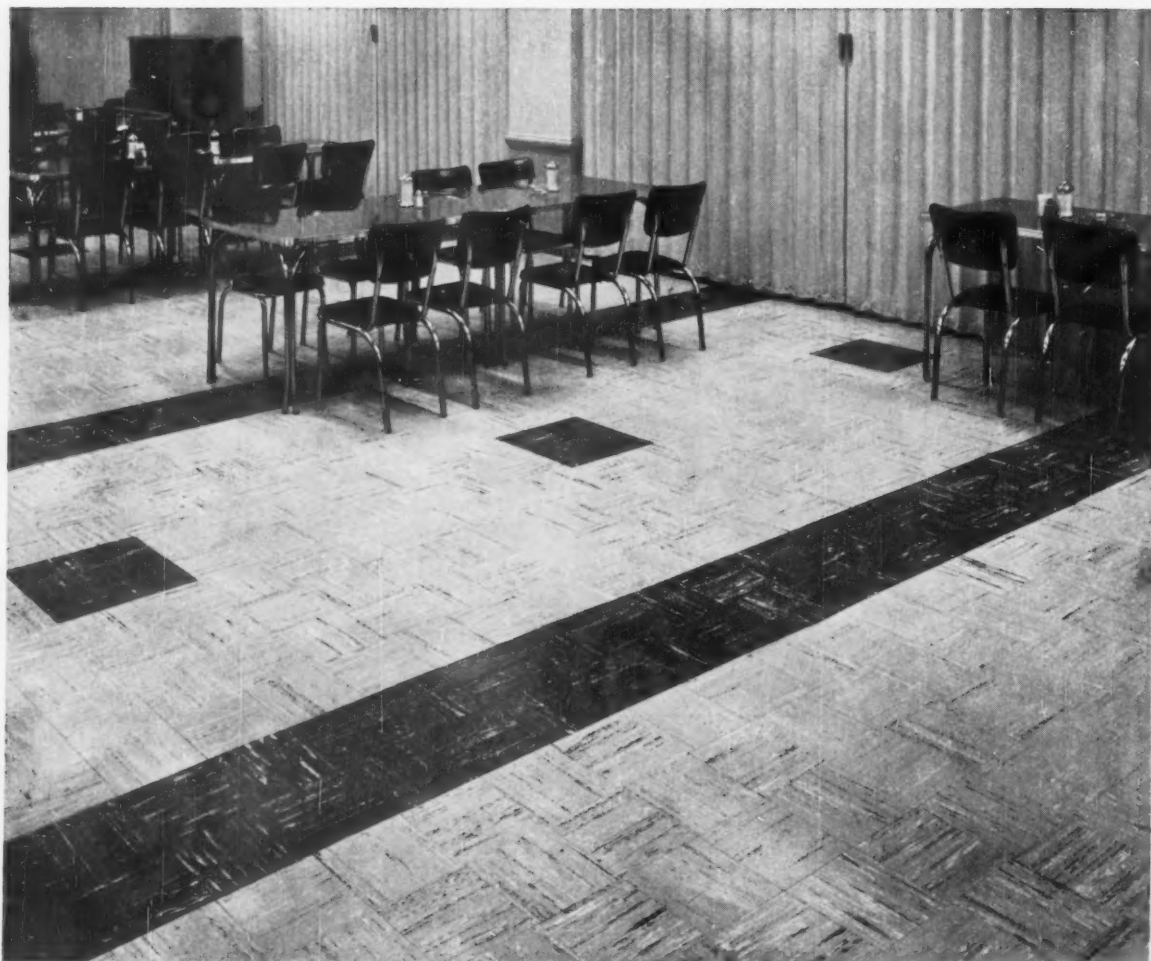
**INSTALLING DISTRIBUTORS IN ALL PRINCIPAL CITIES**  
In Canada: FOLDOOR OF CANADA, Montreal 26, Quebec



**HOLCOMB & HOKE MFG. CO., INC.**  
1545 Van Buren St.  
Indianapolis, Indiana  
Please send full details on FOLDOOR

NAME \_\_\_\_\_  
ADDRESS \_\_\_\_\_  
CITY \_\_\_\_\_ STATE \_\_\_\_\_

E



## GOLD SEAL® VINYLBEST\* TILE FOR CAFETERIAS ...and all other school floors!

**Can't be harmed** by grease, food and beverage spills that are sure to occur.

**High resistance** to the "pot-hole" type of indentation from tables and chairs.

**Bright clear colors** that only plastic materials can provide. Will not yellow!

**So easy to clean!** The plastic in Vinylbest gives a satin-smooth surface that locks out dirt... wipes sparkling clean with a damp mop.

Yes, Gold Seal Vinylbest is the *all-purpose* tile! Just right for basement rooms, kitchens, corridors, laboratories, washrooms—all the "problem" areas in schools! It can be installed over, below, on or above-grade concrete, or over suspended wood. Vinylbest is *permanently* flexible... long wearing... highly resistant to acids, alkalies and cleaning solvents. See versatile Vinylbest at your Gold Seal Dealer, or write for further information: Customer Service Department, Congoleum-Nairn Inc., Gold Seal Floors and Walls, Kearny, N. J.

**SPECIFICATIONS:** 1/4" gauge. Install over, below, on, or above-grade concrete or over suspended wood under floors. 17 colors.



FOR HOME—  
BUSINESS—  
INSTITUTIONS

BY THE YARD AND TILES—Inlaid Linoleum • Nairn® Plastics  
Vinylbest® Tile • Cork Tile • Rubber Tile • Asphalt Tile  
PRINTED FLOOR AND WALL COVERINGS—Congoleum® and  
Congowall®  
RUGS AND BROADLOOM—LoomWeave®



FOR THE LOOK THAT'S YEARS AHEAD

**Gold Seal®**  
FLOORS AND WALLS

\*Trademark

© 1956 CONGOLEUM-NAIRN INC., KEARNY, N. J.



# What's New FOR SCHOOLS

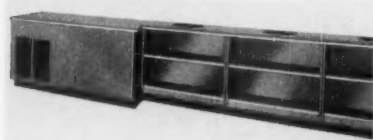
OCTOBER 1956

Edited by BESSIE COVERT

TO HELP YOU get more information quickly on the new products described in this section, we have provided the postage paid card opposite page 218. Just circle the key numbers on the card which correspond with the numbers at the close of each descriptive item in which you are interested. The NATION'S SCHOOLS will send your request to the manufacturers. If you wish other product information, just write us and we shall make every effort to supply it.

## Self-Contained Unit Ventilator Offers Construction Economies

A new gas-fired, forced-air heating and ventilating system with Util-i-Duct bookshelf sections gives individual room heat-



ing and ventilating with unit control. The result of extensive field research and engineering in classroom heating and ventilating requirements and application, the Norman Schoolroom System offers economies in school construction costs. Each room is individually heated, eliminating the need for a separate building for the central heating plant. Any number of classrooms may be added without revamping the heating system.

The new system includes the Norman Schoolroom furnace and enclosure unit with automatically controlled dampers for mixing outdoor and indoor air for healthful and comfortable ventilation. The Util-i-Duct sections provide tempered air distribution throughout the classroom while furnishing handy bookshelf space. The furnace and enclosure unit, as well as the Util-i-Ducts, are built of heavy furniture gauge steel throughout and have recessed kick space.

The furnace and enclosure unit can be installed in a right hand or left hand corner of the room, or anywhere along the outer wall. It is available in 70, 85 and 100,000 BTU input models. Along the top of each Util-i-Duct section is a perimeter diffuser with damper and adjustable louvers for accurate balancing and uniform air distribution at correct angles to blanket the outer wall and prevent drafts. **Norman Products Co., 1150 Chesapeake Ave., Columbus 12, Ohio.**

For more details circle #267 on mailing card.

## Darkening Draperies Have Flame-Resistant Coat

New vinyl-coated fabrics for draperies to darken classroom and auditorium windows is flame-resistant. Designed with color patterns and texture on the inner side, the draperies are of neutral beige on the window side. An intermediate coating of black vinyl ensures

opacity. Made of Du Pont "Tontine," the vinyl drapery material has weight and softness for draping gracefully over large expanses of glass and drawing open into minimum space. The new material can be sewn and pleated and can be hung on regular drapery hardware.

The new drapery material offers permanent flame resistance, high resistance to deterioration in tearing, high tensile strength, resistance to discoloration due to fading, darkening or chalking, does not shrink, stretch or get tacky and has a non-porous dry surface which is easily kept clean since dust shakes off. **E. I. du Pont de Nemours & Co., Wilmington, Del.**

For more details circle #268 on mailing card.

## Special Rugged Construction in Shoninger Classroom Pianos



Designed and built especially for school use, the Shoninger "55" piano is the result of conferences between school authorities, music training instructors and piano engineers. Rigid specifications were set up which include reinforced, rugged construction, specially designed arms, destruction-resistant fall board with lock, direct blow action, double-roller, heavy duty casters and an over all height of only 42 inches.

The Shoninger "55" Piano is built in the tradition of fine quality and custom building used in all Shoninger Pianos. Careful engineering and construction result in a piano offering long, trouble-free service, easy handling, visibility of the player from in front of or behind the piano, and full, rich tone for effective teaching. The new piano was introduced early in the year and has already been installed in a number of school systems, according to the manufacturer. **National Piano Corp., 54 Canal St., New York 2.**

For more details circle #269 on mailing card.

## Fenlite Window Finishing Eliminates Need for Painting

A new finishing process for steel windows is introduced by Fenestra. Known as Fenlite, the process is the result of years of research and produces a finish which does not need painting. It is designed to maintain a bright finished appearance while withstanding the rigors of all weather conditions.

At the electronically-controlled Fenestra plant the Fenlite eight-step process carries the steel windows through vapor degreasing; pickling; rinsing; liquid fluxing; oven drying; zinc alloying; passivating and chemical polishing, and final product assembly. The resulting windows are described as being protected with an alloy bonded, high-luster, zinc surface, providing a bright and highly corrosion resistant finish. **Fenestra, Inc., 2250 E. Grand Blvd., Detroit 11, Mich.**

For more details circle #270 on mailing card.

## Slicer Attachment Facilitates Food Storage

Ingredients for cole slaw, salad, soup or stew can be prepared during slack periods and stored in the refrigerator in a plastic bag, ready for instant use, with a unique attachment recently introduced. The attachment permits the securing of a transparent plastic bag on the housing of either the Blakeslee hopper-front or tubular front slicer to receive the foods as they are sliced or shredded.

Refrigerator space is saved in storage as the filled plastic bags can be accommodated to the space available. When vegetables are to be used for salads,



dressings can be mixed right in the plastic bag by rolling or shaking just prior to serving. **G. S. Blakeslee & Co., 1844 S. Laramie Ave., Chicago 50.**

For more details circle #271 on mailing card.

(Continued on page 172)

## What's New ...

### Sound Can Be Added With Pageant Projector

Narration and background music can be added to any 16 mm film by students,



teachers or administrators with the new Kodascope Pageant Sound Projector, Magnetic-Optical. No special equipment is required to enable a school to add its own sound track to any film. An inexpensive magnetic striping can be added to any 16 mm film on which class or instructor can record narration or music as desired. The machine can be operated by students or teachers and the narration erased and re-recorded as often as desired to provide different messages for various classes or audiences. A magnetic track can be added to the sound film with a conventional "optical" track. The new machine makes it possible to pro-

vide great versatility in the use of films in schools and other educational institutions.

The projector can be used in adding sound tracks to films of athletic events, in changing narration on commercial films to adapt them for classroom needs and in changing sound tracks of films prepared for public relations use. The projector can also be used in perfecting a script for later recording on a permanent optical sound track. Sound movies can be made with the new machine at minimum cost. The new Magnetic-Optical projector has all the features of the Kodak Pageant line of sound projectors. Eastman Kodak Co., Rochester 4, N.Y.

For more details circle #272 on mailing card.

### Acclaim Dishwashing Compound Is Foil-Wrapped

A new mechanical dishwashing compound for use with both melamine and china dinnerware is announced in Acclaim. This chlorinated product is packaged in bright red and white foil in two pound control cartons. It is the result of five years of field testing and research to develop the most effective product possible for satisfactory results in mechanical dishwashing. Economics Laboratory, Inc., Institutional Sales Div., 250 Park Ave., New York 17.

For more details circle #273 on mailing card.

### Utilitarian Unit for Art Classrooms

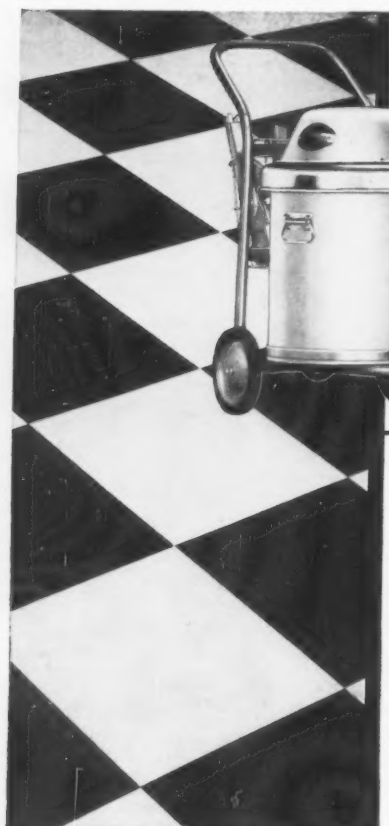
The Westmoreland No. 165-AT Art Desk is a practical and utilitarian unit to take care of all needs in the modern art classroom. The sturdy welded tubular steel frame is stressed and braced for adequate strength, rigidity and streamlined appearance. It is available finished in taupe, turquoise, coral, blue or nickel chrome. The laminated plastic top adjusts to meet all art requirements and can be used for finger painting as the surface is non-staining. A matching



stool is available for use as a seat or as an additional work area. Westmoreland Seating Division, Milnor St. & Bleigh Ave., Philadelphia 35, Pa.

For more details circle #274 on mailing card.

(Continued on page 174)



## the No. 1 way to care for FLOORS and RUGS



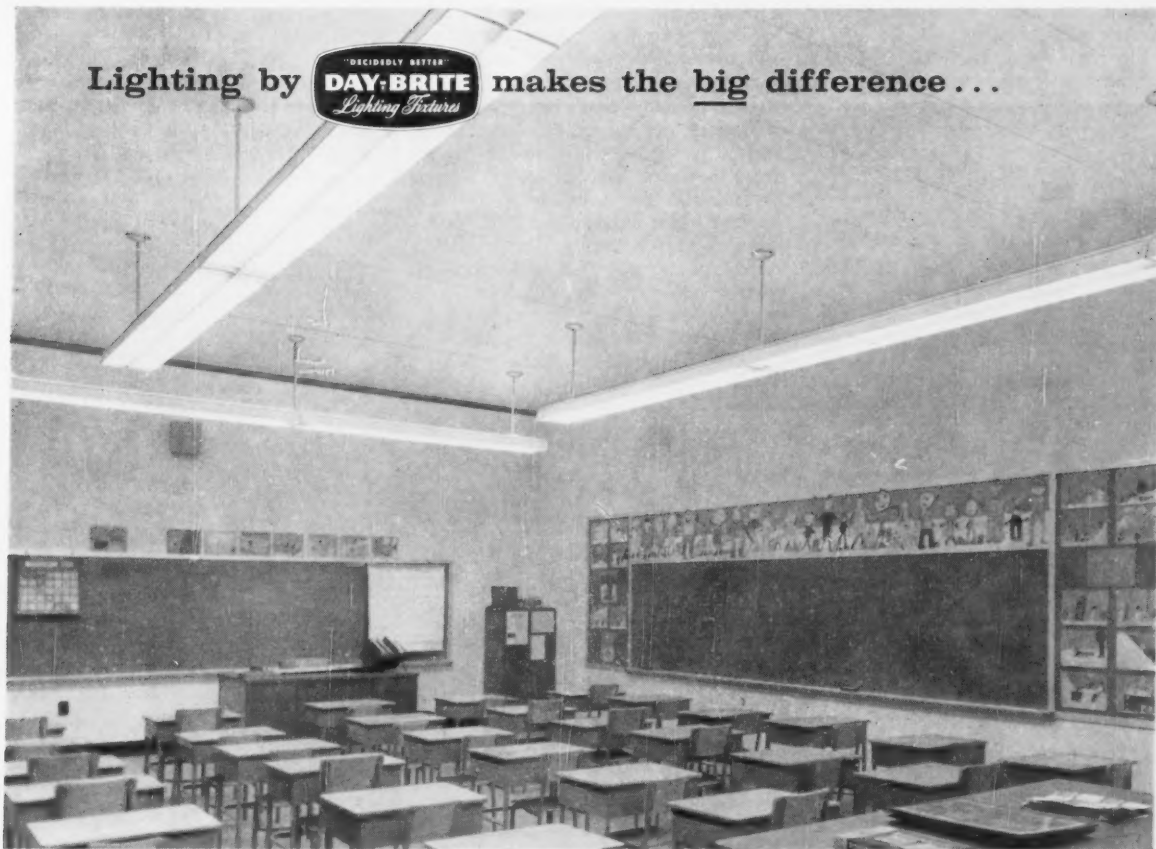
Why limp along with costly mop-and-pail methods or floor machines of limited application? You can be dollars ahead every day by switching to America's most modern, most versatile floor machines . . . the American Floor-King and all-purpose American Vacuum in sizes to fit your requirements. Send today for colorful fast-reading booklet on our new line of vacuums . . . the one line that needs no alibi because every model does every job from floors to rugs to off-floor cleaning.

**THE AMERICAN**  
FLOOR SURFACING MACHINE CO.  
ESTABLISHED 1903

548 So. St. Clair St., Toledo 3, Ohio

performance proved maintenance  
machines . . .  
world-wide sales and service

Lighting by **DAY-BRITE** makes the big difference...



Typical classroom, Jeffery Public School, Pittsburgh, Pa. Trefry Engineering, Designers and Engineers; Walter Electric Co., Electrical Contractors.

## For tomorrow's citizens... Day-Brite lights the way

Education has advanced far beyond the "3-R's" stage. So has school lighting by Day-Brite—as is fully evident from the photographs shown here. The Jeffery Public School, at Pittsburgh, is another of many examples of how the famous Day-Brite LUVEX-U® is lighting the way for tomorrow's citizens. Note the uniform over-all illumination these fixtures provide—on desk tops, table tops, chalk boards. They assure comfort in seeing, relieve eye-strain and fatigue, do a full-time job of protecting students' priceless sight.

Before you decide on any phase of school lighting or relighting, consult your Day-Brite school-lighting representative. You'll find him in your classified phone directory. Or, send for school-lighting data.



View of board room, Jeffery Public School, Pittsburgh, Pa.

Day-Brite Lighting, Inc.  
5451 Bulwer Ave.  
St. Louis 7, Missouri  
In Canada: Amalgamated  
Electric Corp., Ltd.  
Toronto 6, Ontario



61129

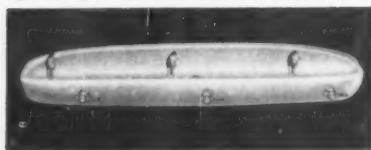
**NATION'S LARGEST MANUFACTURER OF COMMERCIAL AND INDUSTRIAL LIGHTING EQUIPMENT**



## What's New ...

### Multiple Drinking Fountain in Attractive Colors

Modern design, cheerful colors and lightweight yet strong Fiberglas construction are features of the new Haws drinking fountain. Designed by Channing Wallace Gilson, the fountain has flowing contour lines which harmonize



with any style of architecture. The new model is wall mounted, has three bubblers and includes all Haws sanitation features in its construction. The three angle-stream fountain heads are raised and shielded to prevent direct mouth contact and are vandalproof mounted to the receptor. Valves have automatic stream control and are self-closing. Polished chrome plated brass is used for all exposed fixtures.

Fiberglas plastic used in the fountain is exceptionally strong and designed to withstand severe abuse. Its light weight facilitates installation and requires minimum support. The new drinking fountain is available in white and in five decorator colors: Cerulean, Pistachio, Coral Accent, Yellow Mist and Grey Satin. **Haws Drinking Faucet Co., Fourth & Page Sts., Berkeley 10, Calif.**

For more details circle #275 on mailing card.

### Automatic Paper Feed for Photocopy Machine

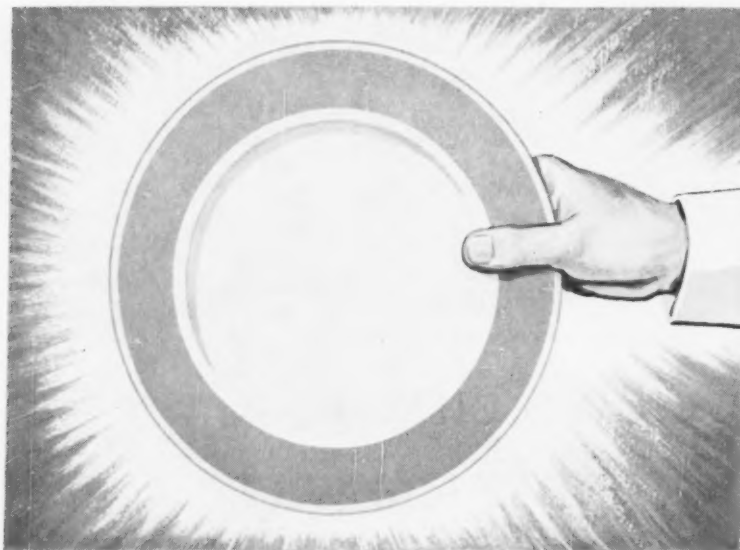
The making of good photo copies is facilitated with the new Auto Feed automatic paper feed for the Dri-Stat Photocopy Machine. Negative and positive sheets are fed into the entrance of the processing unit where they are gripped by two pairs of moving feed rollers, housed entirely within the cabinet. Speed of the stainless steel rollers is synchronized to assure perfect register through the processing solution and up to the exit rollers. Uniform density of the image is assured throughout the finished positive print.



The automatic paper feed facilitates use of the machine and makes it possible to speed up the work without reducing quality of copies. Paper waste is reduced and operation of the machine is more readily learned. **Peerless Photo Products, Inc., Shoreham, L.I., N.Y.**

For more details circle #276 on mailing card.

## Corning Double-Tough Dinnerware keeps its brand new look longer!



Choose from six smart color patterns!



• **There's no surface glaze** to scratch or wear away, so Corning Double-Tough Dinnerware stays new looking much longer. That means real savings to you on replacement costs. Order Double-Tough with green or maroon bands—or with handsome, solid borders of Coral, Gray, Autumn or Aqua, from your Corning Double-Tough equipment dealer.



• **Much lighter!** Double-Tough Dinnerware is 20% lighter than competitive ware. It's far easier to stack, carry and handle.



• **Extra durable!** You save on replacement costs. Double-Tough survives a drop from a height twice as great as other ware.



• **Washes easily!** Double-Tough washes clean quickly and easily. Sticky foods won't cling to that smooth, non-porous surface.

# CORNING DOUBLE-TOUGH Dinnerware

Consumer Products Division, Corning Glass Works, Corning, New York

### Wireless Intercom Suppresses Circuit Noise

A new circuit developed for the Port-A-Phone Wireless Intercom suppresses noise in the electric wiring circuit so that the intercom will work in almost any situation. The portable intercom system requires no wiring or installation. It is easily carried to the location where it is to be used and plugged into the regular electrical outlet. Conversations between units are carried on without interference, due to the new circuit.

Another feature of the new Port-A-Phone is the improved Hush-O-Matic Silencer. This silences the unit when in the stand-by position to prevent disturbance or contact when communication between units is not required. **Feiler Engineering & Mfg. Co., 8026 N. Monticello Ave., Skokie, Ill.**

For more details circle #277 on mailing card.

(Continued on page 178)



# ROLLING MILK DISPENSER BRINGS COLD, REFRESHING MILK TO CLASSROOMS



*EAGER "CUSTOMERS" at Hawley School now clamor for a morning glass of cold, rich, delicious milk. No fuss, no muss and no coaxing.*

Here at the Hawley Grade School in Fort Dodge, Iowa, the mid-morning "milk break" was formerly beset with problems. On warmer days, bottled milk often lost its chill, became flat and was refused or wasted by the children. Serving the milk was a tiresome chore for teachers. There were dripping, untidy bottles to distribute . . . bottle caps and straws to gather up . . . and empties to put back into racks.

● Today, the Hawley School has two self-refrigerated Norris N-10 Super Milk Dispensers mounted on easy-rolling steel carts. One dispenser serves each floor. At milk time, the teacher rolls the cart from room to room, with paper cups aboard. Youngsters line up for a serving of ice-cold, aerated, delicious milk. It's quick, clean, delightful—in *any* weather. And milk consumption has increased 33%, according to Miss Marian Dekker, principal of the Hawley School.

*Want detailed information on this wonderful new idea? Write Norris Dispensers, Inc., Dept. NS-106, 2720 Lyndale Ave. S., Minneapolis 8, Minnesota*



## Norris

### MILK DISPENSERS



*NO BOTTLES, caps or straws. For Mrs. Aliene Schluchter, teacher at Hawley, this means welcome relief from a messy clean-up job.*

# HILD

## COST PROBLEMS?

Hild equipment can solve almost all your maintenance problems with a minimum of labor, time, and cost! Every Hild machine is precision made to give you year after year of trouble-free service . . . many of our original models are still in use today, after 29 years of dependable service!



MODEL C

### Shower-feed Floor Machine

This single Hild machine can scrub, wax, polish, buff, sand, grind and steel wool your floors. Powerful GE motor, adjustable handle, safety switch, and non-marking bumper and wheels. Available in every size and style for every job!

### Keep Your Floors Slip-Safe

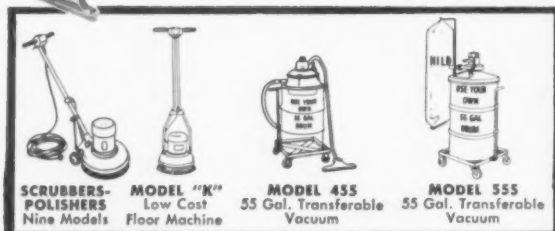
Hild Shower-feed scrubbing and vacuum drying system . . . cleans and dries in minutes! Vacuum lifts dirt and moisture from cracks and low spots . . . removes slick film that causes accidents.



MODEL 115

### Heavy Duty Vacuum

Hild fool-proof vacuum machines for all your floor to ceiling vacuum jobs. Powerful suction action picks up liquid or dry dirt without adjustment or filter change. Gives you utmost convenience, efficiency and rugged durability. Available in 10 to 55 gallon sizes.



SCRUBBERS-POLISHERS  
Nine Models

MODEL "K"  
Low Cost  
Floor Machine

MODEL 455  
55 Gal. Transferable  
Vacuum

MODEL 555  
55 Gal. Transferable  
Vacuum

NS-1056

740 W. Washington Blvd. • Chicago 6, Ill.

**HILD FLOOR MACHINE CO. INC.**

gentlemen: send me more information on

- ☐ Floor Machines  
☐ Portable Vacuums  
☐ All Hild Equipment

Name \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_ State \_\_\_\_\_  
Signed by \_\_\_\_\_

## IN A FLASH

# Naden ELECTRIC

## SCOREBOARDS

### BASKETBALL



The "Instant-Vue" Model N595—pictured at right—is one of the leaders in the big Naden Line which includes a model . . . fully guaranteed for speed and accuracy

. . . for every size gymnasium and every size of budget. Write today for Catalog No. 1N—Basketball; No. 2N—Football; No. 3N—Baseball.

**NADEN AND SONS WEBSTER CITY, IOWA**



## Trim Line

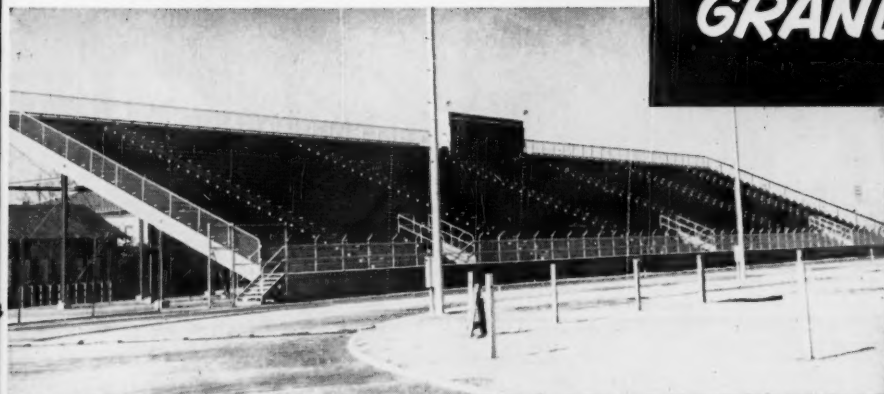
New simplicity of design achieves style, comfort and classroom efficiency with strength to pass the test of time.



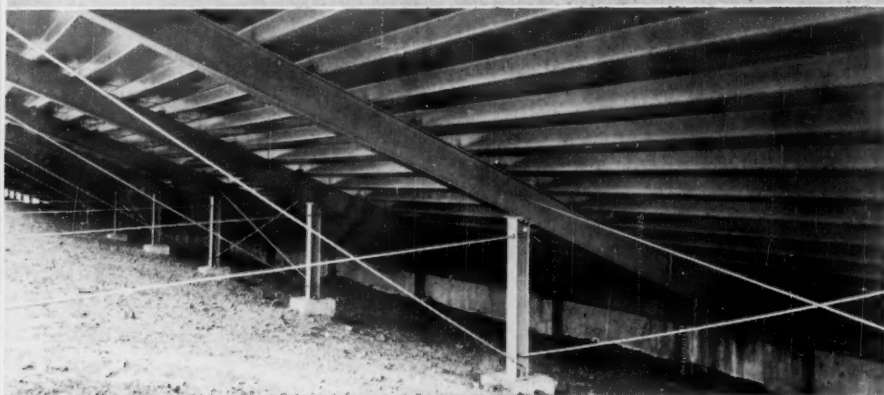
WRITE FOR COMPLETE CATALOG OF TUBULAR STEEL FURNITURE  
Patents are pending on all the pieces of the Heywood-Wakefield Trim Line design. Heywood-Wakefield, School Furniture Division, Gardner, Mass. and Menominee, Mich.

**PITTSBURGH • DES MOINES**

# *Steel Deck* **GRANDSTANDS**



LONG BEACH, CALIFORNIA. David Starr Jordan High School; 5,000 seats. Depth 28 rows, length 306 ft.



TYPICAL UNDERDECK VIEW, showing sturdy steel supports and weathertight deck construction.



NEW CASTLE, PENNSYLVANIA. New Castle High School; 7200 seats. Depth 30 rows, length 360 ft.

Serving  
**HIGH  
SCHOOLS**  
everywhere



North, South, East and West throughout the country, Pittsburgh-Des Moines Steel-Deck Grandstands are at the heart of high school outdoor events. From football to Commencement, these adaptable, handsome stands serve comfort and security throughout the year. Unit-constructed, permanent, low in first cost and low in upkeep, P-DM Grandstands—first choice of progressive school districts—offer truly exceptional value. May we give you the details?

## **PITTSBURGH • DES MOINES STEEL CO.**

Plants at PITTSBURGH, DES MOINES, SANTA CLARA, FRESNO, and CADIZ, SPAIN

PITTSBURGH (25).....	3427 Neville Island	DES MOINES (8).....	926 Tuttle Street
NEWARK (2).....	285 Industrial Office Bldg.	DALLAS (1).....	1226 Praetorian Bldg.
CHICAGO (3).....	1217 First National Bank Bldg.	SEATTLE.....	517 Lane Street
LOS ANGELES (48).....	6399 Wilshire Blvd.	SANTA CLARA, CAL.....	816 Alviso Road
	MADRID, SPAIN.....	Diego De leon, 60	





# SIMPLIFIED sanitary dishwashing!



Dishes wash by the basketful in turbulent 120° to 160° wash water... are quickly, comfortably lifted to adjoining tub to rinse in a flow of 180° water that positively kills surviving pathogenic bacteria.

Plates, cups, glasses, silverware, pots and pans are washed, sanitized and air-dried at the rate of 2000 per hour. You save wages, dish breakage, soap and hot water.



## NEW 3-TUB KEWANEE

provides extra full-size tub, plus additional shallow compartment for gross soil, with special waste and drain. \$684, F.O.B. Kewanee, Ill. (subject to change without notice).

### MAIL THIS COUPON NOW!

Kewanee Dishwasher  
c/o Burlington Ave.  
Kewanee, Illinois

Rush facts on 2-tub, 3-tub and Pre-Wash Kewanee Dishwashers at no cost or obligation.

Name \_\_\_\_\_

Establishment \_\_\_\_\_

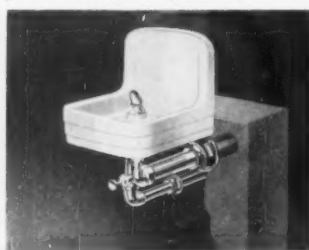
Street \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_

## What's New...

### Outdoor Drinking Fountain Will Not Freeze

Chilled water can be made available all year in the school yard and other out-



door areas without danger of the drinking fountain freezing. The new fountain is wall-hung and serviced by a concealed cooler mounted inside the building wall. Surplus water from the supply and waste lines drains back into the heated portion of the building after each use, making a freeze-proof fixture.

The new freeze-proof drinking fountain is offered in two models. One unit features the Crane Erie Fixture with a single bubbler serving up to fifty persons per hour. The second unit uses the Crane Ontario fixture with two bubblers for double the service. Crane Co., 836 S. Michigan Ave., Chicago 5.

For more details circle #278 on mailing card.

### Room Darkening Unnecessary With Lenscreen "625"

Films and slides can be shown in the classroom without pulling down shades



or turning out lights with the new Lenscreen "625" viewing unit. Source of the clear picture even in daylight is the viewing lens which is described as a transparent, plastic membrane offering a new conception in optics. Pictures are said to be sharp and brilliant with full contrast unaffected by normal lighting.

The portable wide-angle transparent lens-type viewing screen has 625 square inches of area. It is easily carried as it folds to the size of a card table. The Lenscreen opens to position a reverting mirror in a self-contained contrast compartment. It is easily set up on a table or desk and regular projection focus procedure is used. The Lenscreen "625" is built to accommodate a range of vision as long as 75 feet. Polacoat, Inc., Blue Ash, Ohio.

For more details circle #279 on mailing card.

(Continued on page 181)

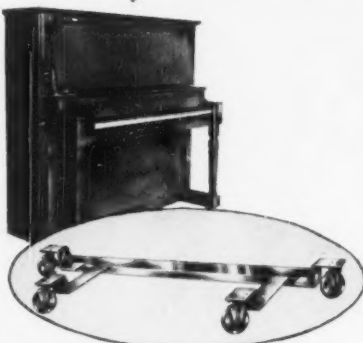
## PIANO MOVING made safe!

For the movers  
For the piano  
For the floors



Model D-260  
Grand Piano  
Carrier

### YOUNG PIANO CARRIERS



### Model D-250 Upright Piano Carrier

- YOUNG Carriers move pianos without tilt or strain. Even with one man, personal safety to the mover is assured.
- Pianos moved without carriers soon go out of tune because of jars and stress. YOUNG'S carriers protect pianos completely.
- The 5" ball-bearing swivel casters used on YOUNG Piano Carriers have thick cushion rubber treads — safe for finest floors.
- Pianos can remain permanently on carriers. Playing is in no way affected. There is a carrier to fit every type and size piano.

Write today for free catalog 5-48.

**UTILITY TRUCKS FOR SCHOOLS**

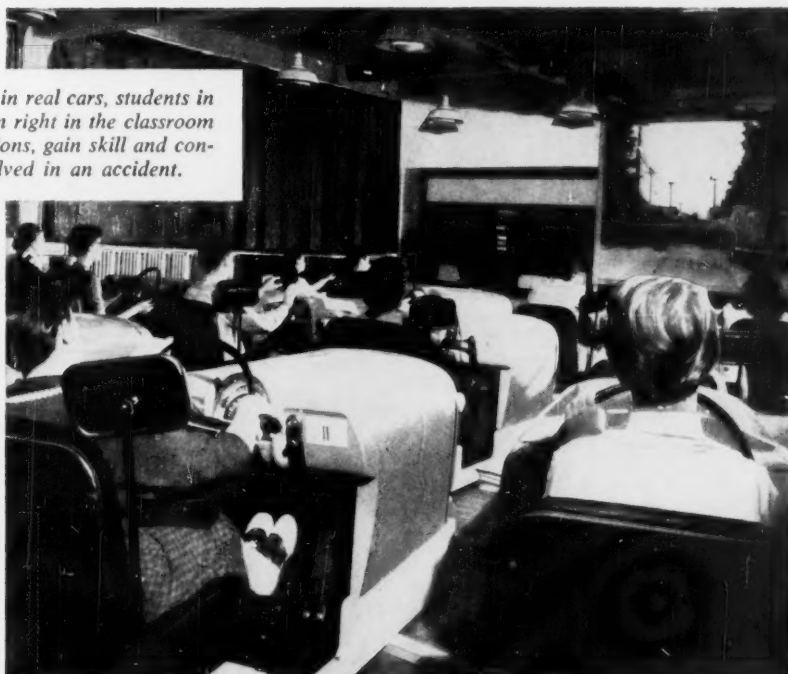
**THE PAUL O. YOUNG CO.**  
School Truck Division  
LINE LEXINGTON, PENNA.



Using instruments and controls found in real cars, students in the Aetna Drivotrainer meet — on film right in the classroom — a wide variety of emergency situations, gain skill and confidence with no danger of being involved in an accident.

*Now—  
train more  
student drivers*

**with no increase  
in staff... and  
at lower cost  
per pupil with**



## THE AETNA DRIVOTRAINER

The demand for driver training in high schools is continually increasing—in some states has been made mandatory. Educators planning expanded driver training programs face critical problems in high costs and lack of teachers.

A growing number of schools has found the answer in the Aetna Drivotrainer. Because it brings behind-the-wheel training right into the classroom, Drivotrainer makes it possible for a typical school (see box at right) to train up to 50% more students without increase in staff — and at a substantial saving in cost per pupil.

### Better Attitudes

Equally important is the fact — demonstrated through controlled research studies — that Drivotrainer instruction has proved to be superior in developing good driving attitudes. And it provides the one completely safe way to give actual practice in meeting road emergencies without any risk of accident.

For more detailed information on the Drivotrainer — and copies of the studies made by the Los Angeles City School Safety Section and Iowa State Teachers College, just fill in and mail the coupon at right.

**AETNA CASUALTY  
AND SURETY COMPANY**  
Affiliated with Aetna Life Insurance Company  
Hartford, Connecticut



### A COMPARISON

In a typical school, with a 180-day year, following recommendations of the National Conference on Driver Education for 6 clock hours of on-the-road training.

When 12 clock hours in a 10-place Drivotrainer are substituted for 3 of the 6 hours of on-the-road practice.\*

4	Teachers Required	4
4	Practice Cars	3
—	Drivotrainer	10-place
400	Students Trained per year	600
\$21,600	Annual Cost**	\$22,950
\$54.00	Cost Per Student	\$38.25

\*Many leading insurance companies now permit the substitution of Drivotrainer instruction for on-the-road training on this basis to qualify for automobile insurance rate reductions.

\*\*Includes maintenance of cars and Drivotrainer, and amortization of cost of Drivotrainer on a 10-year basis.

Public Education Department NS-3  
Aetna Casualty and Surety Company  
Hartford 15, Connecticut

Please send me a copy of the Condensed Report on the Los Angeles and Iowa Studies and additional information on the Drivotrainer.

Name \_\_\_\_\_

Title \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_



**20**  
**DESIGNER COLORS**



**Plus**

**Lifetime**  
**CAST CONSTRUCTION**

**Exclusively Yours**  
**When You Choose**



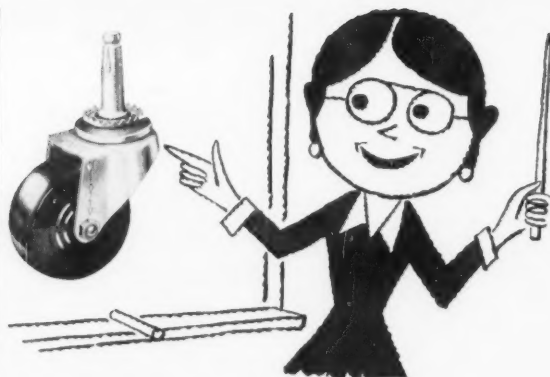
**"CHF" STOOLS and TABLES**

You choose from the widest selection of colors and finishes, with construction unequalled in the entire industry when you select Chicago Hardware Foundry Stools and Tables. In addition, you can choose the same equipment leading designers are specifying today. Every year, many of the top award winners in INSTITUTIONS National Food Contest are equipped with "CHF" Stools and Tables. "CHF" Cast Construction lasts a lifetime. It saves money . . . in maintenance and replacement costs.

**Write Today for New Color Catalog!**



**DISTRIBUTORS IN ALL PRINCIPAL CITIES**  
**THE CHICAGO HARDWARE FOUNDRY COMPANY**  
"Dependable Since 1897"  
33106 Commonwealth Ave. • NORTH CHICAGO, ILL.



## Teacher saver

Saving steps and time in schools is an old story for smooth rolling, easy swiveling Bassick Diamond-Arrow casters.

They've been making carts, cabinets, pianos, cafeteria and other equipment easy to move for years. More recent school uses for Bassick casters are on mobile wardrobes, portable ladders, roll-out grandstands, theater spot lights, filing cabinets, folding tables and stages. There may be an idea here for your school. Ask for long-lasting, low-maintenance Diamond-Arrow casters. **THE BASSICK COMPANY**, Bridgeport 2, Conn. In Canada: Belleville, Ont. 6.53

See our listing in  
AMERICAN  
SCHOOLS AND  
UNIVERSITIES  
BY WHITE PINE PRESS



**Bassick**  
A DIVISION OF



MAKING MORE KINDS OF CASTERS • MAKING CASTERS DO MORE

# CONNOR

forest products since 1872

**"LAYTITE"** maple  
birch  
oak **FLOORING**

has been first choice for gyms,  
play rooms and class rooms

**"CONTINUOUS STRIP"**, Blocks,  
Regular Strips and Slats

School and Gym Floors Our Specialty  
MFMA grades and trade marked

See Sweet's file specs # **13J**  
Co

**CONNOR LUMBER & LAND CO.**

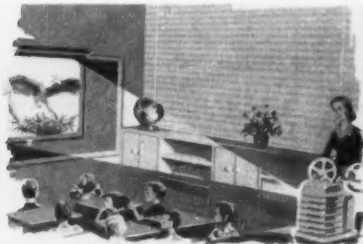
P.O. BOX 810-A, WAUSAU, WIS.

Phone No. 2-2091

## What's New ...

### Interlocking Slats Give Maximum Light Control

A new development in its design gives Eastern's Star Venetian Blind a new appearance with maximum darkness for use in audio-visual classrooms. Improved control over light and air is also possible with the double-arc slats which flow together, giving the blinds a one-piece look.



The interlocking slats keep out all light as the matching notches in slats and cross ladder tapes achieve exact fit. Extra flanges on head channel and brackets act as light traps above the top slat. Side and bottom channels may be mounted on window casings and sills for virtually complete blackout.

When open, the new blinds give maximum visibility since the wider slats give increased width between the opened slats. The sturdiness of the slats makes fewer tapes necessary for firm control. More air and light enter through the wider-spaced slats and tapes and light rays are diffused softly by double-arc deflection. The one-piece closure creates air-pocket insulation between blind and window, helping to keep the classroom temperature from falling unduly when they are closed at night. An exclusive method of applying du Pont colloidal silica anti-soil compound, Ludox, to Eastern's Star slats helps to keep them clean.

Eastern's Star venetian blinds are available as horizontals or verticals. Verticals look and operate like traverse draperies while giving perfect control over light, air and privacy. The center linkage separates automatically for drawing vertical blinds to the side, whether slats are open or closed. The Eastern Venetian Blind Co., 1601 Wicomico St., Baltimore 30, Md.

For more details circle #281 on mailing card.

### Bus Flasher Light Is Oval in Shape

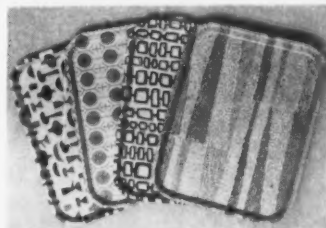
To distinguish the school coach flasher light from that used on trucks and emergency vehicles, the new Superior Coach Flasher Light is oval in shape and features a special convex lens. The convex lens is designed to permit the flasher to be seen from any angle up to 90 degrees on either side of the coach and higher candle power is incorporated for increased visibility. Superior Coach Corp., Lima, Ohio.

For more details circle #282 on mailing card.  
(Continued on page 182)

### Decorated Trays Give Cheerful Touch

Attractive designs are used on the new Tempo-Trays for food service in schools and other institutions. They add a cheerful, decorative note and are styled to harmonize with modern decor. The trays are offered in twelve different patterns, each in a choice of three color combinations. Trays illustrated were designed by such well known artists as George Nelson and Paul McCobb. Also in the line are trays designed by Salvador Dali, Isamu Noguchi and other leading designers. The new Bolta

Tempo-Trays have all of the durability and other excellent qualities of un-

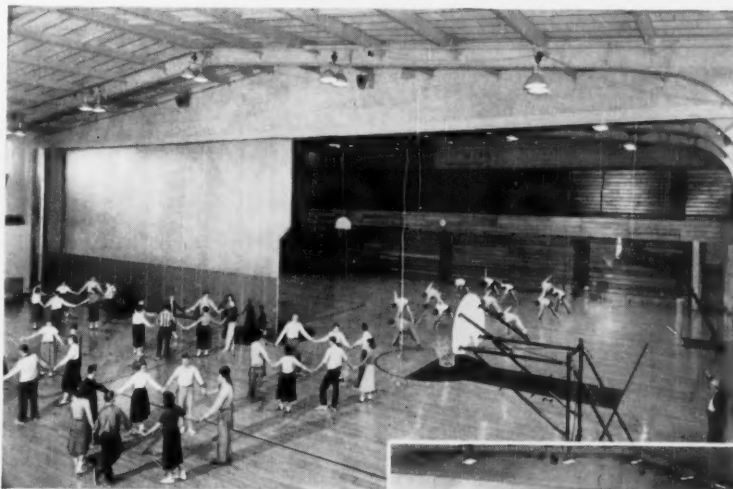


rated Bolta trays. Bolta Products, Lawrence, Mass.

For more details circle #280 on mailing card.

## Another first by **R-W!**

### New "FoldeR-Way" Aluminum Partitions



Childs & Smith, Architects, Chicago

Only R-W  
gives you so much more

New Beauty! Modern Design!  
Everlasting Performance!

- ★ **No painting expense**—ever! Each section made of smooth, flush, durable aluminum.
- ★ **Lightweight!** 3" thick partition sections weigh 50% less than conventional designs.
- ★ **Scientifically engineered!** Honeycomb internal construction provides maximum strength, minimum weight and minimum sound transfer.
- ★ **Dimensional stability!** Not affected by humidity or temperature changes.
- ★ **Fully automatic electric operation!** Key switch control does it all.

For details and specifications,  
write for **FREE** catalog today

This R-W "FoldeR-Way" aluminum partition installed in West Senior High School at Aurora, Illinois, is the first aluminum gymnasium folding partition ever installed anywhere! Electrically operated and fully automatic, a turn of the switch key does everything.



520 W. THIRD STREET, AURORA, ILLINOIS  
Branches in Principal Cities  
SLIDING DOOR HANGERS & TRACK • ELECTRIC DOOR OPERATORS • FIRE DOORS & PARTURES • INDUSTRIAL DOORS & EQUIPMENT • INDUSTRIAL CONVEYORS & CRANES  
SCHOOL WARDROBES & PARTITIONS

## What's New ...

### Holiday Lighting Fixture Has Prismatic Controlled Light

The comfort of prismatic controlled light is offered in the new Day-Brite



Holiday lighting fixture. Designed specifically for application in low-ceiling areas, the Holiday is an enclosed, surface-mounted fixture. Two injection molded prismatic elements are incorporated in the hinged four-foot enclosure. Lens control provides sufficient upward component to light the surrounding ceiling area.

The new Holiday is equipped with Rapid-Start ballasts and can be furnished as four-foot or eight-foot units with ends, and eight-foot fill-in section with coupling. Day-Brite Lighting, Inc., 5411 Bulwer Ave., St. Louis 7, Mo.

For more details circle #283 on mailing card.

### Translucent Drapery Fabric Is Vinyl Impregnated

Attractive appearance, simplified maintenance and durability are some features of the new Rice Translucent Vinyl Drapery Fabric. Four attractive decorator colors are available in the TV fabric: Soft Cream, Golden Hue, Pale Green and Cocoa. The durable, water repellent material resists dust, dirt and grime and can be wiped clean with a damp cloth. It drapes in soft folds, yet does not chip or peel.

The new Rice TV Drapery diffuses and scatters direct sunlight, producing soft, comfortable light on the brightest days. The new draperies are designed for long life, are economical in use with minimum maintenance required. Tailored so that they lie flat without creases or pleats when removed from the windows, the new draperies can be sponged or washed quickly and easily, due to the special vinyl coating. They are available in sizes and lengths for any school need. Chas. W. Rice & Company, Inc., Union City, Ind.

For more details circle #284 on mailing card.

### Miniature Tape Recorder Is Battery-Powered

The Dictet Recorder is a battery-powered unit which weighs only slightly

(Continued on page 184)

more than two and one-half pounds. It is a portable tape recorder made largely of magnesium with a completely transistorized amplifier. It is truly portable and designed for voice recording at any time or place. Controls for starting and stopping, recording, power rewinding and playback are simple and functional and a full hour of recording can be accomplished on the magazine-loaded magnetic tape.

The new Dictet can be converted into a transcribing machine through use of small plug-in attachments. Tapes can



be re-used endlessly as recordings can be automatically erased by a separate magnet in the Dictet. Dictaphone Corp., 420 Lexington Ave., New York 17.

For more details circle #285 on mailing card.



emphasis on  
structural strength  
and contemporary design

126 years the leading makers of  
chairs and tables for public use



1310 stacker

1216 chair, 801 desk

Write us your seating requirements.  
We will send appropriate  
illustrated material.

**THONET INDUSTRIES, INC.**

One Park Avenue, New York 16, N. Y.

**SHOWROOMS:**

New York

Chicago

Dallas

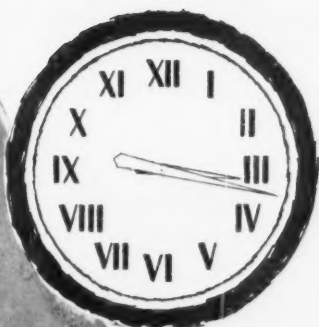
Los Angeles

Miami

Statesville, N. C.

**THONET**  
INDUSTRIES, INC.





# School's out for teacher, too!

## Thanks to those two priceless teaching aids—DITTO and DITTO WORKBOOKS

What a wonderful feeling—to leave when school is out—to enjoy full peace of mind, free from teaching cares and worries—as carefree in an adult way as your boisterous pupils. To be able to enjoy hours of relaxation, swimming or tennis or golf, knowing that your day's work is done—and to spend the evening with a book—or in some sort of self improvement—or socially at some gay party.

Yes, "school is truly out for teacher too" when you have DITTO and DITTO Workbooks to relieve you of worrisome lesson planning—to rid you of tedious copywork—to banish tiring nightwork—and to make your classroom hours pleasant and rewarding. DITTO Workbooks, in the words of one outstanding educator, "the greatest teaching aid of modern times".



### THE NEW DITTO D-10

Absolutely the last word in a low priced school duplicator. Always ready to turn out up to 300 or more bright copies at rate of 120 per minute, in 1 to 5 colors, at once. Of anything typed, written, traced or drawn . . . No stencil, No mats, No inking, No make ready . . . on any size copy from 3" x 5" to 9" x 14" . . . at just pennies in cost. Mail coupon for free demonstration.

### 59 NEW DITTO WORKBOOKS

For reproduction on Liquid Machines, each book containing pre-printed daily lesson material ready for making up to 300 or more bright copies on your DITTO Duplicator. Written by teachers—Edited by nationally recognized educators. Each \$3.25. Choose from any of the splendid new titles in the DITTO Workbook Catalog. Send for free sample copies.

For brighter Classes—Easier Teaching—**MAIL COUPON NOW.**



**DITTO, Incorporated**  
3334 Pratt Avenue  
Chicago 45, Illinois

Gentlemen:  
Without obligation, please:

- ☐ Send literature on your new D-10 Liquid Type School Duplicator.
- ☐ Send FREE: Samples and catalog of new Workbook Lessons.
- ☐ Arrange a DITTO Demonstration for me.

Name

School

Address

Post Office  County  State

## What's New ...

### Lightweight Luminaire for Indoor Lighting

A twin-tube, ceiling-attached luminaire offering superior light control is available



in the new Realite. It has a new type total prismatic enclosure known as Prismalume which is designed to give a new concept in fluorescent lighting. Prisma-

lume is a precisely molded element which controls light in all directions and provides a high level of downward light and an indirect component along the ceiling, while eliminating all glare from the direct viewing zone.

Realite is a versatile unit designed to integrate with most modern architecture. It accommodates two fluorescent lamps in each four foot length. Units can be ganged together to form continuous runs without transverse supports. It can be installed directly on the ceiling or with pendant hangers. It has lightness and strength, permitting installation econ-

omies in new construction and in old buildings. The luminaire is easily cleaned and is lightweight and shatter-free. Holophane Company, Inc., 342 Madison Ave., New York 17.

For more details circle #286 on mailing card.

### Floating Action Tone Arm Protects Records

Young children can now be permitted to operate record players in the class-



room without fear of damage to records. The new Viscous Damped Tone Arms have an unusual floating action which floats the arm onto the record without damage. Developed for use with Gray High Fidelity Equipment for audio-visual classroom use, the new Gray Viscous Damped Tone Arm is available with or without the Gray Turntable. Gray Research & Development Co., Manchester, Conn.

For more details circle #287 on mailing card.

**It's a nation-wide trend!**

Baltimore, Maryland	Kewanee, Illinois
Boise, Idaho	Monmouth, Illinois
Brookline, Massachusetts	Multnomah County, Oregon
Fresno, California	Phoenix, Arizona
Jersey City, New Jersey	Providence, Rhode Island
Los Angeles, California	San Francisco, California
Berkeley, California	Tucson, Arizona
Boston, Massachusetts	Peoria, Illinois
Eau Claire, Wisconsin	Pinellas County, Florida
Hillsborough County, Fla.	Richmond, California
Kansas City, Missouri	San Mateo, California
Moline, Illinois	Vallejo, California
Beverly Hills, California	Philadelphia, Pennsylvania
Brisbane, California	Portland, Oregon
Farmington, New York	San Diego, California
Jackson, Mississippi	San Jose, California

Here's a partial list of actual and consistent users of Walk-Top

## WALK-TOP has been selected for smooth surfacing playgrounds by schools across the nation

We will welcome an opportunity to supply you with full information on Walk-Top. Or, if you prefer, we can put you in touch with school executives in your area who have specified Walk-Top for surfacing and sealing their play yards.

Just call our office nearest you.



### American Bitumuls & Asphalt Company

200 Bush St., San Francisco 20, California  
Baltimore 3, Md.  
Mobile, Ala.  
Inglewood, Calif.

St. Louis 17, Mo.  
San Juan 23, P.R.  
Oakland 1, Calif.

Perth Amboy, N.J.  
Cincinnati 38, Ohio  
Tucson, Ariz.  
Portland 7, Ore.

WALK-TOP® is one of the family of famous *Lucas* products

LEADING MARKETERS OF ASPHALTS, CUTBACKS AND BITUMULS—NATIONWIDE

### Correction Seal for Key-Punch Errors

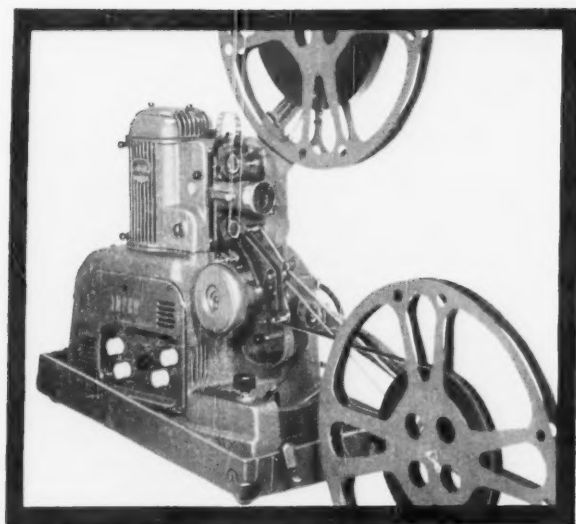
Super-thin seals that stick without moistening are now available for plugging key-punch errors. The permanent Brady Correction Seals are mounted on a handy dispenser card for fast application in case of error, 216 per card. The Seals are not affected by humidity or storage, cannot dry out or fall off corrected cards, according to the manufacturer, and register as corrections in the verifier. W. H. Brady Co., 727 W. Glendale Ave., Milwaukee 12, Wis.

For more details circle #289 on mailing card.

(Continued on page 188)

# THE Sights and Sounds OF THE WORLD

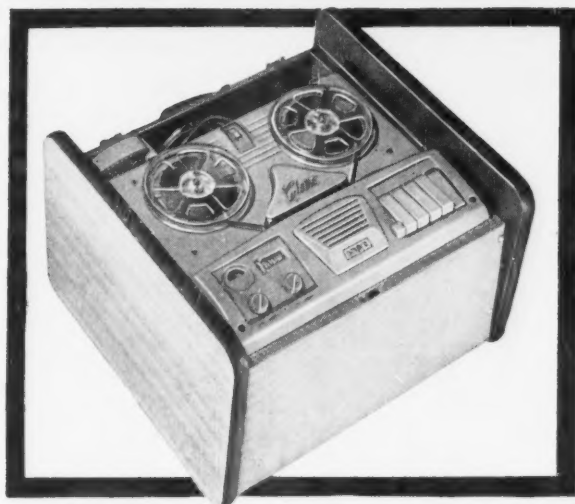
...WITH IMAGINATION-STIRRING REALISM



It's a new adventure for student and teacher alike when Ampro Audio-Visual equipment joins the faculty. Products of more than a quarter-century of experience, Ampro projectors and tape recorders, reflecting a unique awareness of the specialized requirements of the classroom, offer realism in sight and sound that inspires teaching and learning.

## Ampro Super Stylist-8 16mm sound projector

The low-cost Super Stylist-8 combines quality performance, long life and rugged construction with exceptional value. Its 7½-watt amplifier provides a degree of sound volume and fidelity usually associated with higher-priced projectors. Illumination up to 1000 watts and Coated Super 2-inch F/1.6 lens assure sharp, brilliant pictures. 8-inch Alnico-5 P.M. speaker mounted in lift-off case cover. ....\$439.50



## Ampro Classic Two-speed tape recorder

There's no need to handle this tape recorder with kid gloves! Cabinet is durable and tough—shockproof, scuffproof, scratchproof, childproof. Shock-absorbing bumpers protect inset mechanism. Electro-Magnetic "Piano-Key" Controls; 6" x 9" Alnico-5 Permanent Magnet Speaker. Automatic Selection Indicator and many more convenience features. ....\$257.50

See and hear for yourself how faithfully Ampro interprets the sights and sounds of the world. Call your authorized Ampro Audio-Visual Dealer, or mail the coupon.

# AMPRO CORPORATION

A Subsidiary of General Precision Equipment Corporation



AMPRO CORPORATION  
1345 Diversey Parkway, Chicago 14, Illinois

136

Gentlemen: Without obligation, I would like to have more information about the subjects checked:

- ☐ Ampro Super Stylist-8 Projector
- ☐ Ampro Classic Tape Recorder
- ☐ Name of my authorized Ampro Audio-Visual Dealer

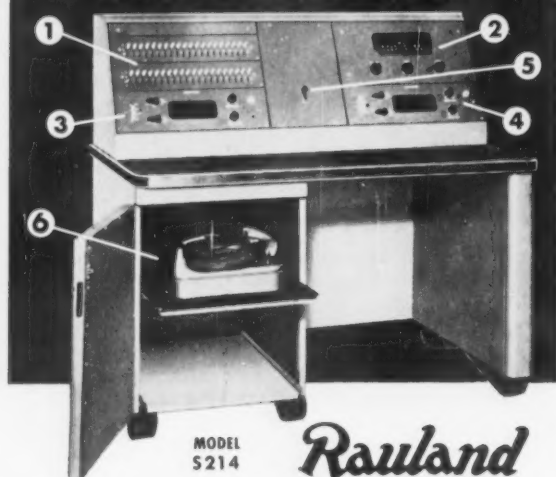
Name \_\_\_\_\_

School or Church \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ Zone \_\_\_\_\_ State \_\_\_\_\_

## Unsurpassed Educational Tool CENTRAL CONTROL ALL-FACILITY SCHOOL SOUND SYSTEM



MODEL  
S214

**Rauland**

### VERSATILE DUAL-CHANNEL SYSTEM

Here, at minimum cost, is the *complete* answer to administrative problems. This All-Facility Console distributes administrative information instantly for up to a total of 40 classrooms; feeds microphone, radio and phono programs to any or all rooms, and provides 2-way conversation between any room and central control Console. Includes every modern feature to enhance instruction and improve administration.

#### Your choice of every desirable program facility

##### 1 SWITCH PANEL

Selects any or all rooms (available with up to 40 room capacity). Distributes any 2 programs; selects communication and room-return.

##### 2 FM-AM RADIO

Selects any radio program on the complete FM band or the entire AM standard Broadcast band for distribution to any or all rooms.

##### 3 PROGRAM PANEL

Selects and distributes any of 2 microphones (one at Console and one remote), Radio or Phonograph.

##### 4 INTERCOM

This panel serves as the second program panel and as the intercom panel permitting 2-way conversation with any room.

##### 5 ALL-CALL SWITCH

An Emergency and All-Call feature—instantly connects all rooms to receive programs or instructions.

##### 6 RECORD CHANGER

Highest quality Automatic Changer plays records of all sizes and all speeds.

This System is also available in S114 Console model, less desk. Write for full descriptive details covering these quality-built, ultra-modern systems.

#### RAULAND-BORG CORPORATION

Rauland-Borg Corporation  
3515-N West Addison St., Chicago 18, Ill.

Send full details on RAULAND School Sound Systems.

We have . . . . . classrooms; auditorium seats . . . . .

Name . . . . . Title . . . . .

School . . . . .

Address . . . . .

City . . . . . Zone . . . . . State . . . . .



**Apsco**



### A point to remember

Apsco's Premier Portable pencil sharpener has been aptly called, "Teacher's step-saver."

Sits handsomely on the desk; fits snugly in the drawer when not in use.

Just one of the famous line of pencil sharpeners and desk accessories from



**America's School Choice!**  
**Apsco products inc.**

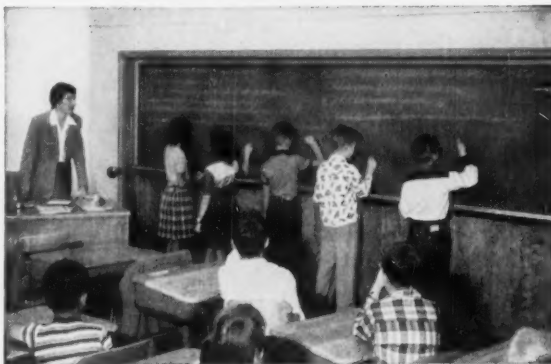
Los Angeles, California

Rockford, Illinois • Toronto, Canada

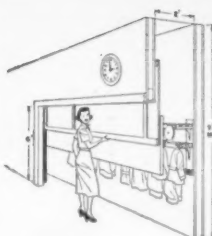


**Barcol**

**WARDROBE**door



**WARDROBE BEHIND CHALKBOARD** is reached by easy upward movement of 2-section Barcol **WARDROBE**door. Full-view opening gives teacher control of "cloak-room rush." Provides more working wall space for chalkboard or tackboard, more usable floor space clear of pivots and hinges. Advertised to school officials. Call your Barcol distributor... under "Doors" in phone book.

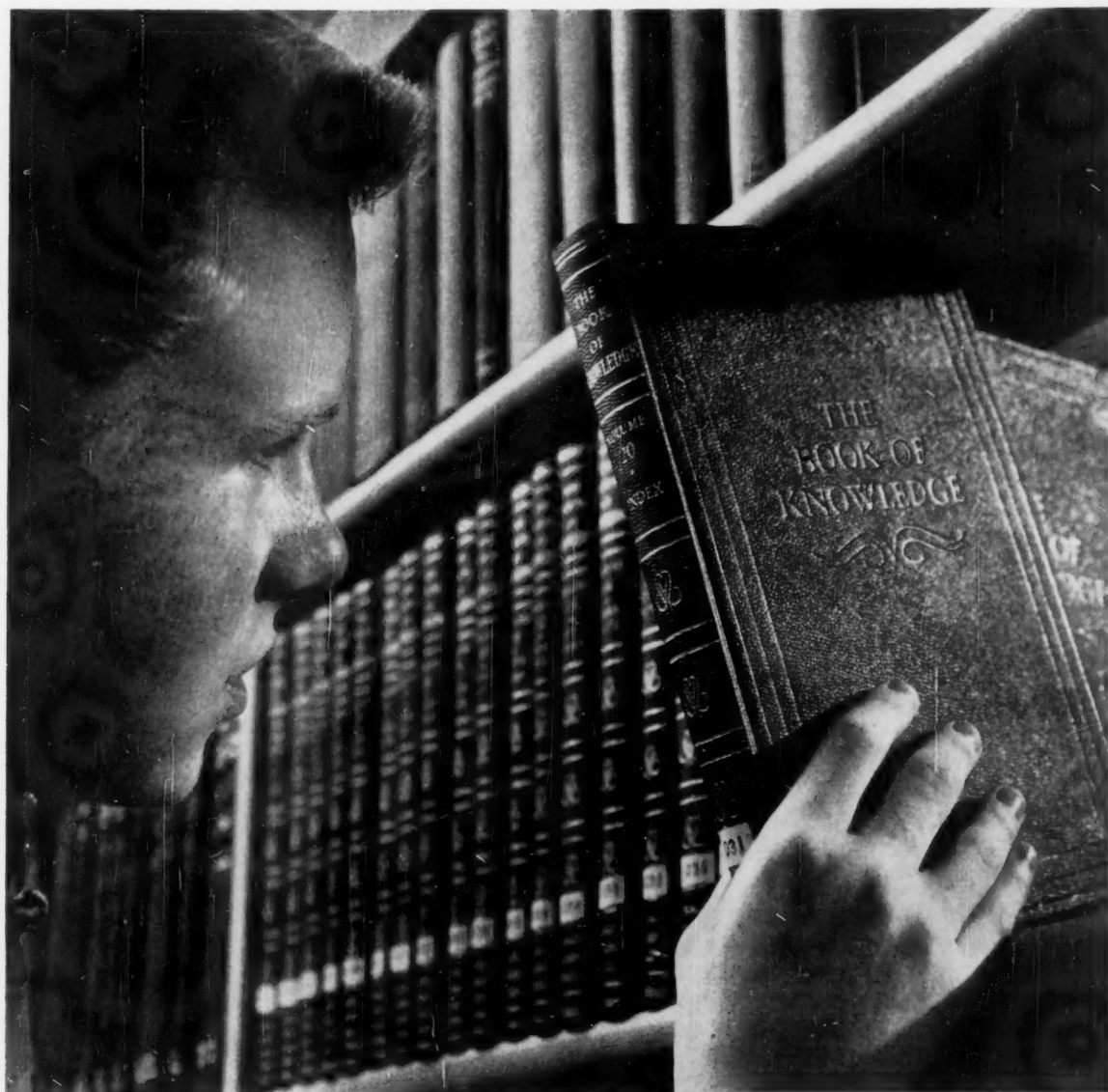


**Barber-Colman Company**

DEPT. NB-610, ROCKFORD, ILL.



**HE'S REACHING FOR MORE  
THAN HE KNOWS!**



Through The Book of Knowledge he will enter the wonderful world of reading . . . and live in it the rest of his life.

**Discover the modern Book of Knowledge!**

20 volumes of enrichment material for classroom and library • Quick fact-finding cross-index plus 1860 concise fact entries • 12,200 illustrations: big, dramatic bleed photographs, drawings, modern charts and maps —all in beautiful color and black and white.

## **THE BOOK OF KNOWLEDGE®**

*The Children's Encyclopedia*

A publication of THE GROLIER SOCIETY INC.® 2 West 45th Street, N. Y. 36, N. Y.

# INSTANT contact between all school or college departments

WITH MODERN, AUTOMATIC

## Federal DIAL INTERCOMMUNICATION

—the private telephone system that meets all needs of administrative officers, teaching staffs and service facilities for faster exchange of information!



- **SYSTEM** operates 24-hours-a-day free of office switchboard . . . 100% confidential.
- **PROVIDES** officials with direct line to all department heads and instructors.
- **GIVES** speedy contact with gym, cafeteria, library, dormitories, maintenance, etc.
- **PROVIDES** dictation to remote recorders from any intercom phone . . . day or night.

- **LOCATES** personnel by voice or code paging . . . gives signals to student body.
- **GIVES** right-of-way to emergency calls by instant break-in on "busy" stations.
- **ALLOWS** up to five staff members to talk to each other—simultaneously.
- **SAVES** hours of time daily . . . saves money . . . increases efficiency of entire staff.

"Certified by a World of Research"

**LOOK AHEAD** if you are planning new school buildings . . . talk to your architect about a complete Federal Dial Intercommunication System.

Write for booklet, to Dept. G-8169

**Federal Telephone and Radio Company**  
A Division of  
International Telephone and Telegraph Corporation  
100 KINGSLAND ROAD • CLIFTON, N. J.



### HOME MAKING LABORATORY AND ART ROOM FURNITURE

For more than sixty years Peterson furniture has set the pace for style and design. Peterson engineers and leading educators, studying together the requirements of school furniture under actual working conditions, have built into each piece of equipment a quality and workability that has made Peterson the leading choice of educators for many years.

Our representative will gladly assist in any problem you may have . . . or if you prefer, write on your letterhead for our illustrated catalog.

**LEONARD PETERSON & CO., INC.**

1226 FULLERTON AVENUE, CHICAGO 14, ILLINOIS

## What's New . . .

### Chair Caddy Is Double-Width

Folding chairs can be easily handled with minimum effort with the new Midwest Double-Width Caddy. It will



handle two rows of chairs side by side and is available in lengths of 60, 72, 84, 96, 108, 120 and 132 inches as well as in adjustable models. Built of heavy duty channel iron with welded joints, the chair caddy is equipped with easy-rolling rubber tired casters for ease in handling. **Midwest Folding Products, Roselle, Ill.**

For more details circle #290 on mailing card.

### Floor Machines Go Up Easily on Safety Ramp

Floor machines are easily taken up or down stairs without danger of injury to the custodian or damage to the machine with the newly developed Safety Ramp. Made of strong, lightweight aluminum, the Safety Ramp is easily set up and permits safe carrying of any standard



sized floor machine up to 21 inches in diameter. The two eight foot sections cover long stairways and the ramp can be adjusted to cover only two steps. Safety catches are built into the sections every six inches to prevent machines from falling, even if the custodian lets go of the handle.

The new Safety Ramp is not only a convenience for custodians, but helps to protect valuable equipment from damage in being carried up or down stairs, and minimizes the possibility of injury to all maintenance men and other employees. **Safety Ramp Co., 158 Edgehill Drive, Akron 12, Ohio.**

For more details circle #291 on mailing card.

(Continued on page 190)

# "We can prove to ourselves the economy of Libbey Heat-Treated DATED Glassware"

HOT SHOPPES, INC.  
5101 RIVER ROAD  
WASHINGTON 16, D. C.

J. WILLARD MARRIOTT  
PRESIDENT

Libbey Glass  
Division of Owens-Illinois  
Toledo 1, Ohio

Gentlemen:

Your Heat-Treated DATED Glassware has allowed us to check accurately the number of servings per tumbler in our Hot Shoppes restaurants all over the country. We have proved to ourselves the economy of Libbey Heat-Treated DATED Glassware in our restaurants, and are considering its use in our newest venture, the Marriott Motor Hotel. Scheduled to open this fall just outside Washington, D. C., it will be the world's largest motel.

A check of our restaurant operations all over the country revealed that only 27.5 per cent of the glasses now in use are at least a year old -- in other words, we are serving our patrons with practically new sparkling glasses.

The average tumbler use is 739 servings -- at an amazingly low cost of 8.8 cents per 1,000. Libbey Glassware provides the fine service we like to give our patrons.

Sincerely yours,

*J. Willard Marriott*  
J. Willard Marriott

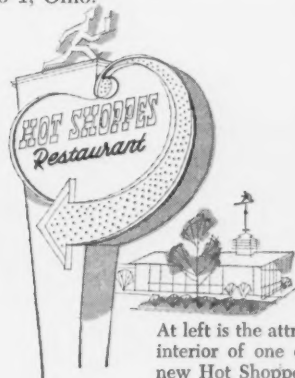


Mr. J. Willard Marriott  
President of the  
Hot Shoppes, Inc.

For seven years a code symbol on the bottom of every Libbey Heat-Treated glass has made it possible to trace this revolutionary ware in almost every type of use.

Mr. J. Willard Marriott, President of the Hot Shoppes, Inc., chain of Washington, D. C., and Past President of the National Restaurant Association, is convinced of the economy of Libbey Heat-Treated DATED Glassware . . . as are restaurant operators throughout the country. You can prove to *yourself* the economy of the world's first DATED Glassware . . . prove that Heat-Treating and the Libbey guarantee: "A new glass if the rim of a Libbey 'Safedge' ever chips" provide the finest glassware service at the lowest cost per serving.

Your Libbey Supply dealer has complete details. See him or write Libbey Glass, Division of Owens-Illinois, Toledo 1, Ohio.



At left is the attractive interior of one of the new Hot Shoppes restaurants using Libbey

Heat-Treated DATED Glassware. To check your own glasses just look at the Heat-Treated mark on the bottom of each tumbler. Numbers indicate date of manufacture--left shows year and right shows quarter. Add up the number of servings to see the amazing economy of Libbey Heat-Treated DATED glasses.

LIBBEY HEAT-TREATED GLASSWARE  
AN **①** PRODUCT

OWENS-ILLINOIS  
GENERAL OFFICES • TOLEDO 1, OHIO



## What's New ...

### Closed-Circuit TV Monitors Study Hall

A nine inch television camera weighing only five pounds serves as a study



hall supervisor when combined with a 17 inch monitor unit located in the general office of the school. Camera and monitor unit are connected by a coaxial cable concealed in the ventilating ducts in the wall. A secretary or other supervisor can supervise the students in the study hall by glancing at the monitor while conducting other work. The public address system of the school forms audible contact between study hall and office.

The GPL closed-circuit television sys-

tem adapted for this special use saves time and energy of teachers formerly used in supervising study halls. Already in operation in the New London, Wisconsin, high school, the system is accepted by the pupils as a result of an excellent public relations program carried out by Superintendent of Schools, Paul K. Loofbore, and his staff, according to the report. **General Precision Laboratory, Inc., Pleasantville, N.Y.**

For more details circle #292 on mailing card.

### U. L. Listed Exit Lights Have One Piece Steel Frame

One-piece body frames of fused steel are a feature of the new line of U.L. listed recessed and surface-type exit lights. All units are finished with a rustproof neutral tone aluminum bronze which resists dirt and dust. Baked white Fluracite enamel is used for the interior reflecting surfaces for maximum illumination. Added illumination over the point of exit is provided in the surface-type units with glass bottom panels.

The new line also features an upward opening door to eliminate fumbling and groping during maintenance and relamping. Exit lights are available in 198 varieties to meet all local codes. **Curtis Lighting, Inc., 6135 W. 65th St., Chicago 38.**

For more details circle #293 on mailing card.

### Wide Steam Cooker Takes Side-By-Side Pans

The Cleveland Range Steam Cooker is now available in a new model designed to take cafeteria pans side-by-side, rather than front-to-back. Two standard 12 by 20 inch cafeteria pans can be placed on each of six steaming shelves in the new model, making them all readily accessible and visible from the front. The new steamer also accommodates standard 12 by 20 inch containers four, six and eight inches deep, and 18 by 26 inch flat bake trays.

The new steamer is fast and convenient for small-lot cooking as well as for

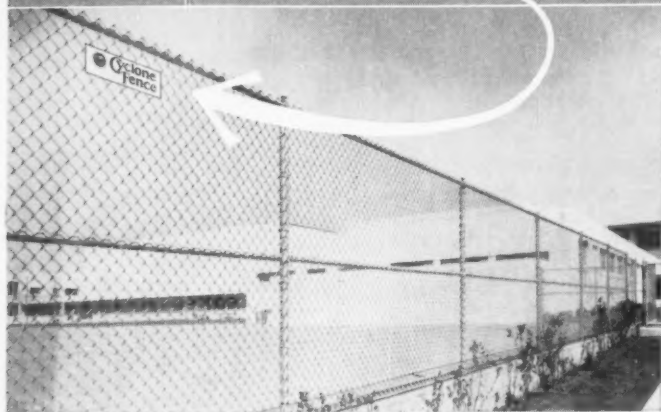


large quantities. It is available for gas, electric or direct-connected steam operation, in two, three and four compartment units. **The Cleveland Range Co., 3333 Lakeside Ave., Cleveland 14, Ohio.**

For more details circle #294 on mailing card.

(Continued on page 194)

Whatever your school fencing needs...  
get the best... **GET CYCLONE!**



**NO JOB IS TOO LARGE — NO JOB IS TOO SMALL FOR CYCLONE**

CYCLONE FENCE DEPARTMENT, AMERICAN STEEL & WIRE DIVISION  
UNITED STATES STEEL CORPORATION  
WAUKEGAN, ILLINOIS • SALES OFFICES COAST-TO-COAST  
UNITED STATES STEEL EXPORT COMPANY, NEW YORK

Only United States Steel Corporation manufactures  
Cyclone Fence. Accept no substitute.

# USS CYCLONE FENCE

UNITED STATES STEEL

Every school needs fence. Every modern, well-run school deserves good fence—like Cyclone. When you enclose your school property, you want protection—for students, for buildings, for grounds. All this you get with Cyclone, but you also get much more. Cyclone Fence is built to give you years of trouble-free service, without undue maintenance and painting. Cyclone Fence is good-looking; it adds to the appearance of your school plant. And Cyclone Fence is economical, too. It gives full value for every dollar spent.

Only brand-new, top quality materials are used in the construction of Cyclone Fence. Posts and top rails are heavy and rigid. Gates won't drag. Every part is heavily galvanized to offer greatest resistance to rust and corrosion. The chain link fabric and barbed wire are galvanized after weaving, leaving no bare spots that would encourage rust. And Cyclone Fence is erected by full-time Cyclone-trained experts. Ask our experienced representatives for advice, and send coupon for free Cyclone Fence booklet.

CLIP THIS COUPON—MAIL IT TO

Cyclone Fence  
Dept. M-106  
Waukegan, Ill.

Please send me, without obligation, complete information on Cyclone Fence and Gates.

Name .....

Address .....

City ..... State .....





Many design possibilities are available with Flexachrome. Custom-made inserts, such as the Caduceus at the right, can do much to create special decorative effects.

## Install Cheerful Floors of Flexachrome ...a sure cure for drabness

**Colorful, l-o-n-g-wearing**  
**Flexachrome** smiles at school traffic  
in reception rooms, corridors, kitchens,  
first aid stations, etc.

Here's why. This vinyl-asbestos  
floor tile is highly resistant to wear,  
greases, acids, alkalis, stains and  
scuffs.

It's a cinch to keep sanitary and  
clean. Waxing is not necessary  
unless a high gloss is desired.

Flexachrome can pay for itself in  
maintenance savings alone, not to  
mention the added beauty and extra  
service.

**Have your local Tile-Tex Con-  
tractor** make an appointment to call  
on you with complete information on  
Flexachrome and the other Tile-Tex  
products listed below. You'll find his  
name in the classified telephone di-  
rectory or by writing:



## TILE-TEX ... Floors of Lasting Beauty

Manufacturers of Flexachrome\*...Tile-Tex\*...Tuff-Tex\*...Vitachrome\*...  
Holiday†...Mura-Tex\*...and Modnar†, the "plank-shaped" asphalt tile in wood-tone colors.



Additional data on Tile-Tex products is  
in *American School & University* and  
*Patterson's American Education*.

### THE TILE-TEX DIVISION THE FLINTKOTE COMPANY

1234 McKinley Ave., Chicago Heights, Illinois.

*In the 11 Western states:*  
Pioneer Division, The Flintkote  
Company, P.O. Box 2218, Ter-  
minal Annex, Los Angeles, Calif.

*In Canada:*  
The Flintkote Company of Can-  
ada, Ltd., 30th St., Long Branch,  
Toronto.

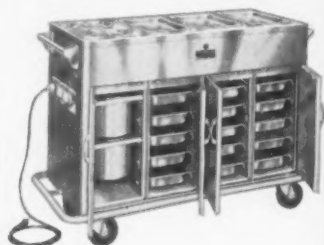
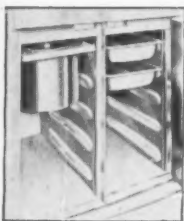
\*Reg. U.S. Pat. Off.  
†Trademark of The Flintkote Company

**NOW, NACO HCP ELECTRIC  
FOOD CARTS STORE  
50% MORE FOOD, KEEP MEALS  
HOT HOURS LONGER**



Guess who was served last from a NACO electric food cart!

The girl on the left was last, yet her meal stayed hot, too, because now all NACO HCP models have strip heaters in both top and bottom sections.



And cleaning is a breeze. Tray runners formed on one-piece, die-stamped side panels replace separate angle irons. No cracks or crevices to catch dirt.

Food stays hot hours longer, even in the lower sections because new strip heaters have been added, as well as Fiberglas insulation in the base. Louvered walls allow uniform heat circulation inside compartments.

The new NACO Model HCP-2000 stores 50% more food than Model HCP-165 — actually 373, 26 oz. meals for children or 220 adult-meals, averaging 44 ozs.

Both Models HCP-165 and HCP-2000 available in standard and deluxe stainless-steel finishes. For Complete information, write:

**ATLAS** DIVISION  
NATIONAL CORNICE WORKS  
1323 Channing Street  
Los Angeles 21, California



everything in electronics for the SCHOOL

**FREE**

**ALLIED'S  
356-PAGE 1957  
CATALOG**



get the most widely used  
**ELECTRONIC SUPPLY GUIDE**

Order from the one complete, dependable school supply source for all your electronic supply needs. We specialize in equipment for training purposes: see our complete listings of famous KNIGHT-KITS—unsurpassed for quality and value. Depend on our experts for time-saving, money-saving electronic supply service and personal help. Write today for the 1957 ALLIED Catalog—your guide to everything in Electronic supplies.

*World's Largest Stocks*

- Electronics Training Kits
- Test Instruments & Kits
- Hi-Fi Audio Equipment
- Recorders & Accessories
- School Sound Systems
- Tools and Books
- Tubes and Transistors
- Thousands of Parts

Send for  
**FREE CATALOG**

**ALLIED RADIO**  
100 N. Western Ave., Dept. 10-K-6  
Chicago 80, Ill.

**SPECIALISTS IN ELECTRONIC  
SUPPLY FOR SCHOOLS**

Our 36th year



**TUBULAR  
STEEL  
FOLDING  
CHAIR  
NUMBER**

**77**



UPHOLSTERED SEAT

**QUALITY AND DURABILITY**

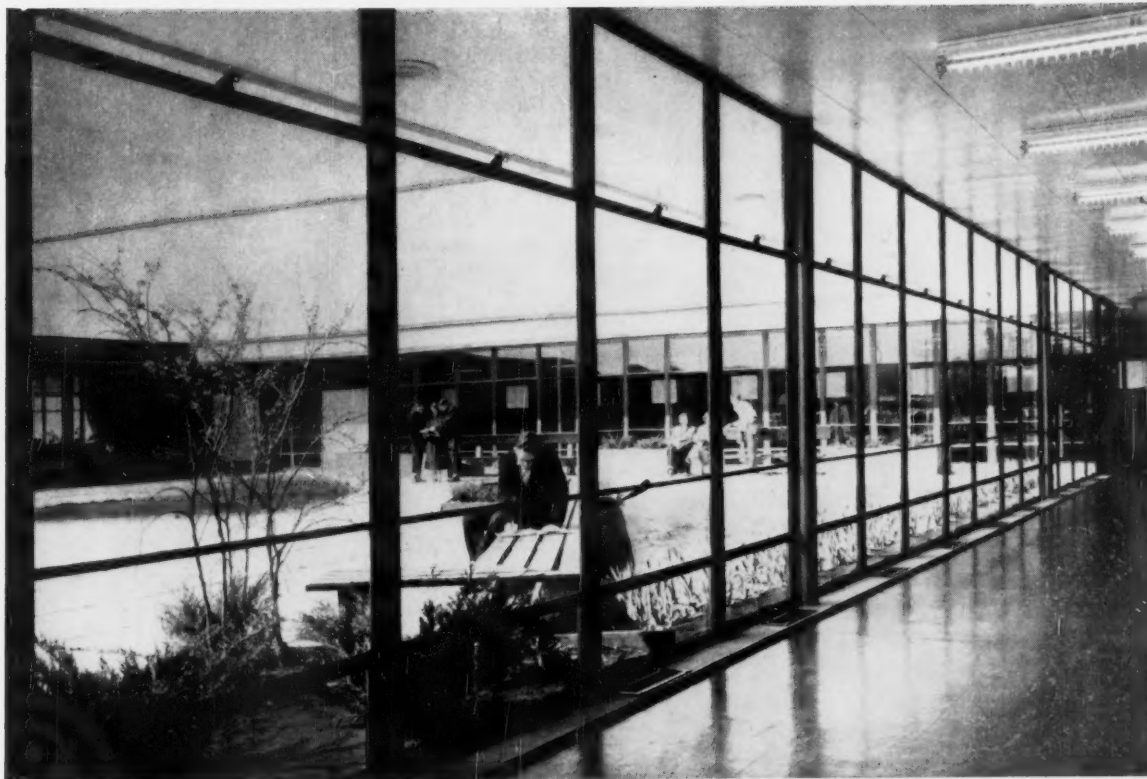
Yes! The best seating chair buy available anywhere, is HAMPDEN. Built for a lifetime of service, comfortable, handsomely designed. Ganging fixtures easily adaptable.

Compare this chair with any other in the country for quality and price. You'll agree, HAMPDEN costs less for greater value.

**Hampden**

SPECIALTY PRODUCTS, INC.  
BATHAMPTON - MASSACHUSETTS

Write Department 1J  
for illustrated brochure  
of complete line



L-O-F Daylight Walls in Norman High School, Norman, Oklahoma.  
Architects: Caudill, Rowlett, Scott and Assoc., Oklahoma City, Okla.  
and Bryan, Texas; Perkins & Will, Chicago, Associated Architects.

## THIS SCHOOL'S A HAPPY PLACE...

Here's picture-perfect proof that school corridors don't *have to be* dark and dreary tunnels.

And across the way, *more* Daylight Walls make the *classrooms* light and bright and view-full. No wonder this school's a happy place for children.

44 out of 45 teachers surveyed in a research project were highly pleased with Daylight Walls.

Typical comments:

"Students do not get tired and restless, because there is no feeling of confinement."

"The lighter, brighter surroundings create a good environment for learning."

If you'd like the complete study, mail the coupon at the bottom of the column at the right.

### DAYLIGHT WALL FACTS

*Daylight* is the primary source of light for classrooms. Since most of the United States is cloudy or overcast during most of the year (especially during school months), the main problem is to bring *enough* daylight in. The Daylight Wall *answers* that problem. In a typical 24-foot-wide classroom, on a dark, overcast day with only 500 foot-candles of light on the Daylight Wall, there can be 53 foot-candles or more on even the last row of desks from the windows. That is *23 more foot-candles* of eye-easy light than the minimum recommended by the American Standard Practice for School Daylighting! That's what clear glass will do for you.

Let us send you a booklet giving you valuable information concerning:

Light needed on various room surfaces

Bilateral, clerestory, monitor design

Window variations to fit the need

Light transmittance data

Dept. 43106  
Libbey-Owens-Ford Glass Company  
608 Madison Avenue, Toledo 3, Ohio

Send me Daylight Walls booklet M-12  
and a report by Prof. Paul R. Hensarling.

Name \_\_\_\_\_  
(Please Print)

Address \_\_\_\_\_

City \_\_\_\_\_ Zone \_\_\_\_\_ State \_\_\_\_\_



# DAYLIGHT WALLS

**LIBBEY • OWENS • FORD**

...A GREAT NAME IN GLASS

## What's New ...

### Square-Round China Saves Table Space



Tables set with the streamlined Syracuse Trend China do not look crowded

and have room for all needed pieces with more places set. The square-round shape is functional, giving full food-serving area in small overall diameter. The attractive Syracuse Berkley Pattern in Trend China shown in the illustration makes an effective tray setting. It also saves space when used in cafeterias, lunchrooms and other dining areas. The china is sturdy and easy to handle and is designed especially for institutional food service equipment. Onondaga Pottery Co., 1858 W. Fayette Street., Syracuse, N.Y.

For more details circle #295 on mailing card.

### Molded Synthetic Shako Resists Wear and Weather

Tough, durable lightweight synthetic material is used to mold a one-piece individually made shako body. The new unit is undamaged by rain, perspiration



or hard usage. It is molded in the proper oval head shape and is a rugged, resilient shako which is virtually indestructible. The oval form lends itself to modern design while offering long wear with extra comfort. The All-Weather Shako is available in the C-51 West Point style. Uniforms by Ostwald, Inc., 73 Henry St., Staten Island 1, N.Y.

For more details circle #296 on mailing card.

## Strong Folding Tables by HOWE

Howe folding tables are especially designed for comfortable seating and rugged wear. They're light, strong—and practically indestructible. They fold smoothly and compactly—take up minimum space when not in use.



**HOWE**  
Square Leg  
Table

All steel chassis. A brace at each leg for extra strength and a leg at each corner for engineering balance. Riveted and welded throughout. Choice of several different tops and sizes.

All steel chassis with retreating leg fold. Strong, fool-proof lock with self-tightening principle. Two separate braces for each pair of legs. Braces are riveted to chassis. Choice of several different tops and sizes.



**HOWE**  
Pedestal Leg  
Table



**HOWE**  
Bench and Table  
Combination

Dimensions: Table—30" x 72" x 27" high. Benches—9 1/4" x 72" x 16" high. Folded position—17 1/2" x 72" x 38 1/2" high.

This revolutionary folding bench and table unit is a wonderful convenience for cafeteria, classroom and many other uses. Converts quickly into a bench with back rest, or a two tier "bleacher." Folds automatically and can be moved with ease. No more lifting or lugging. It literally "floats" along.

IF IT FOLDS—  
ASK

**HOWE**

HOWE FOLDING FURNITURE, INC. ONE PARK AVE. • NEW YORK 16, N.Y.

### Fence Coating Tool Has Extra-Long Nap

Lamb's wool with an extra-long 1 1/2 inch nap is used on the new fence-coating tool introduced by Rust-Oleum. Designed especially for use in coating and



maintaining wire fences, the extra-long nap reaches around the fence wires and coats a high percentage of both sides of the wire in one stroke. The 1 1/2 inch length was selected as giving the greatest wrap-around action without matting down on adjacent fence wires. Oversize sleeve diameter gives the roller greater carrying capacity and minimizes waste and spatter, thus protecting grass or pavement beneath the fence. The new roller tool can also be used in coating cinder block and similar irregular surfaces. Rust-Oleum Corporation, 2799 Oakton St., Evanston, Ill.

For more details circle #297 on mailing card.  
(Continued on page 196)



# justly, the pride of six communities!

New Senior High School of the Chambersburg Joint School Authority, Chambersburg, Pa., serving six school districts. Architects: Lawrie and Green, Harrisburg, Pa.



One of many splendid features—this ideal multi-purpose gymnasium, end-result of the meeting-of-minds of 36 forward-looking school directors.

## Floored, for a long future, with **NORTHERN HARD MAPLE**

The endurance, resilience and brightness that have made Northern Hard Maple flooring virtually the universal choice for gymnasium and multi-purpose rooms, make it ideal for other hard-usage school areas. It fights abrasion and impact, doesn't splinter. Cleaning and maintenance are easy. Refinishing, when finally needed, is simple (there's always a "new floor" underneath). Specify Northern Hard Maple with the confidence it has earned. It is available in regular strip or in block and pattern designs, in standard, warranted **MFMA** grades, offering almost endless variety. The **MFMA** mill-mark is your warranty of strict grading, genuineness of species and precision manufacture.



### SEE SWEET'S

—Arch. 13J-Ma, for full technical data.

### WRITE

—for 1956 official **MFMA** listing of approved floor finishing products.

## MAPLE FLOORING MANUFACTURERS ASSOCIATION

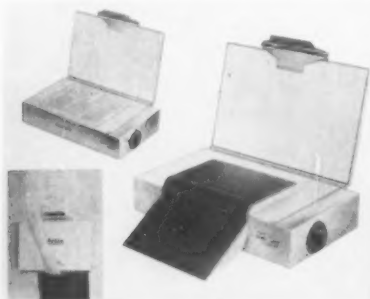
SUITE 589, PURE OIL BUILDING, 35 EAST WACKER DRIVE •

CHICAGO 1, ILLINOIS

## What's New ...

### Book Copier Is Compact Unit

The Apeco Panel-Lite Copier is a new compact unit designed especially to copy



pages from books and magazines. It is styled to give snug contact on any bound page to make a sharp, clear copy of the entire page from the gutter to the outer edges. Similar exact copies can also be made from any other typed, written, printed or other material requiring a flat bed printer.

The lightweight, compact unit is engineered to be used with the Apeco Autostat as well as other processing methods. Made with a built-in automatic timer, it measures 19½ by 13 by four inches in size. Special three-ply filtered glass is used for the copying surface. The new copier has a removable cover to

facilitate use and is priced to fit within the budget of even small schools. American Photocopy Equipment Co., 1920 W. Peterson Ave., Chicago 26.

For more details circle #298 on mailing card

### Mohawk Series Fixtures for Low Ceilings

Four different styles of shielding and extreme flexibility are features of the new Mohawk line of lighting fixtures especially designed by Sylvania for low ceiling rooms. The fixtures are offered in two widths, the Chief which is 13½ inches wide and the Super-Chief which is 23¾ inches wide. The shielding can be obtained in the form of plastic or metal louvers, dished plastic or a low, brightness lens. The louvers are designed for use in entrance rooms and corridors and the dished plastic and low brightness lens for use in schools and rooms where glare is a problem.

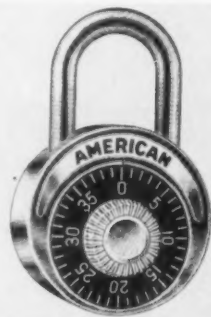
The new fixtures are available in both four and eight-foot units and may be surface mounted in a continuous-row installation. They are 3¾ inches deep and are made of 20 gauge steel wrap-around construction. A special hinging arrangement permits the entire shield to either swing down for re-lamping or for servicing. Sylvania Electric Products Inc., 1740 Broadway, New York 19.

For more details circle #299 on mailing card.

### Key-Combination Padlock Has Stainless Steel Case

The new Junkunc American Combination Padlock with key control has a nickel plated steel staple and stainless steel case with bright finish. The combination is large enough for easy dialing and the attractive blue finish of the face with large white numerals makes it easy to operate the combination in dark corridors and in locker rooms.

The key control feature makes it possible for administrators and other officials to open the padlocks for cleaning and inspection of lockers without loss of time



in checking combinations. The padlocks are constructed to withstand hard wear of school locker use. Junkunc Brothers, 1145 W. Garfield Blvd., Chicago 21.

For more details circle #300 on mailing card.

(Continued on page 200)

## Anticipating the Trend of the Future

**THE NEW IRWIN No. 900 DESK  
DESIGNED FOR JR. and SR. HIGH SCHOOLS, IS A  
REAL PACE SETTER IN DESIGN, IN VALUE, IN USE**

1. **LARGE TRAPEZOIDAL-SHAPED TOP**  
designed for maximum writing area, provides good arm support and allows easy ingress and egress.
2. **POSTURE FORM SEAT AND BACK REST**  
induces student to sit upright;  
provides greater comfort; reduces fatigue.
3. **LARGE BOOK RACK (OPTIONAL)**  
provides visible, readily accessible storage space.
4. **REQUIRES MINIMUM FLOOR AREA,**  
permits close spacing; more desks per room.
5. **WEIGHT EVENLY DISTRIBUTED,**  
provides exceptional strength and stability.
6. **G-E TEXTOLITE TOPS — School DESK  
PATTERN or SIMULATED BIRCH.**  
Proven through years of test in actual use.

No other desk offers all these functional advantages. For further details concerning the CLASSMATE DESK and the complete line of IRWIN classroom and auditorium furniture . . .



Write for current  
CATALOG

**This easy-to-care-for flooring saves up to 50% on maintenance costs!**



Heavy traffic in this Budd Company R. D. C. diesel-powered passenger car has little effect on the durable J-M Terraflex floor. A quick damp mopping will restore it to its first-day color beauty.



Terraflex is especially serviceable in hospitals. Commonly used mild acids and disinfectants do not affect it . . . its nonporous surface assures a high degree of sanitation with a minimum of care.

## Johns-Manville **TERRAFLEX** Vinyl Asbestos tile flooring . . . beautiful, colorful, incredibly durable!

**A**CTUAL ON-THE-JOB FIGURES show that Johns-Manville Terraflex® floor maintenance expense is reduced as much as 50%, when compared to the next most economically maintained resilient type flooring.

A quick damp mopping usually keeps Terraflex clean and bright . . . its nonporous surface requires no hard scrubbing . . . frequent waxing is eliminated. Despite heavy traffic service . . . spilled liquids and foods . . . abusive treatment,

Terraflex retains its sparkling, new appearance.

J-M Terraflex vinyl asbestos tile, available in 17 attractive marbled colors, is the ideal flooring for restaurants, public areas, schools, hospitals . . . wherever reliable floor service, long-wearing beauty and maintenance economy must be combined.

For complete information about Terraflex vinyl asbestos floor tile, write Johns-Manville, Box 158, New York 16, N. Y.

See "MEET THE PRESS" on NBC-TV, sponsored on alternate Sundays by Johns-Manville

*Check these special TERRAFLEX advantages*



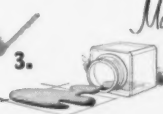
### 1. *Lasts Longer*

Made of vinyl and asbestos, Terraflex will outwear any other type of resilient flooring of equal thickness.



### 2.

Dirt can't penetrate Terraflex's nonporous surface. A swish of a damp mop keeps it shining bright.



### Easy to Clean

### Maximum Service

Terraflex defies kitchen oils and greases . . . strong soaps will not dull its lustre.



### 4.

### Wide Color Range

Terraflex comes in 17 marbled colors that go all the way through the tile—won't wear off or wash out.



### 5.

### Greater Resilience

Terraflex is flexible, provides comfort and quiet underfoot . . . resists indentation.



**Johns-Manville**





## Look what HUSHED High School Hubbub !

Here's a classroom in the new Rock Falls, Ill., Township High School. They hushed the hubbub here, saved the teachers' nerves and improved the learning process by sound-conditioning with Gold Bond Acoustifibre.

Fire-resistance went into this modern school, too. Lightweight Acoustifibre has a flame-resistant white paint covering that decorates while it protects. Made from wood fibres interlaced to form millions of tiny, sound-trapping channels, Acoustifibre tiles literally "swallow up" the noise that strikes their surfaces. There are 484 clean round holes in each square foot.

Acoustifibre's handsome factory-applied shell white finish gives high light-reflection without harsh glare. It's chemically treated against mould and fungus—and it's repaintable without loss of sound absorption. Acoustifibre panels may be used over new or existing ceilings.

**CALL YOUR GOLD BOND ACOUSTICAL CONTRACTOR**—for expert acoustical service. His name is in the yellow pages of your phone book under "Acoustical Contractors". National Gypsum Company, Buffalo 2, N. Y.

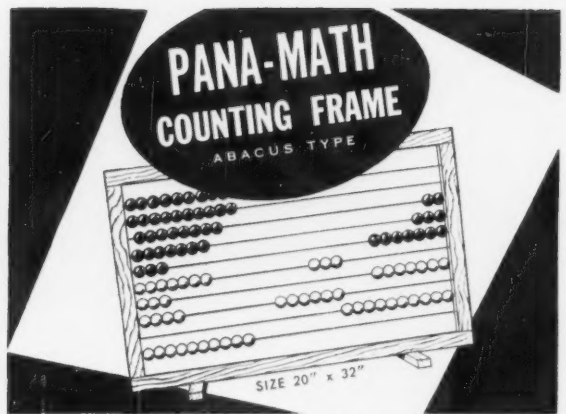
### ACOUSTICAL PRODUCTS

NATIONAL GYPSUM COMPANY  
Dept. NS-106,  
Buffalo 2, New York

Please send me your new booklet, "Quiet and Education", which gives the full School Sound Story by Gold Bond.

Name \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_ County \_\_\_\_\_ Zone \_\_\_\_\_ State \_\_\_\_\_

**Gold Bond**  
BUILDING PRODUCTS



Grade 1 to 4 Requirement

### for effective visual math teaching

Pana-math is a versatile classroom counting frame for incidental learning of the important concepts of arithmetic. The ancient abacus is now adapted as a modern aid to visualize numbers, groups and relationships by actual arrangement of beads. Sturdily constructed of 13/16" hardwood the frame has 10 removable push-spring rods each with 10 colorful beads. Specify Pana-math for all new or replacement counting frame equipment. (Pat. No. 2,655,737)

• Time Teaching Clocks • Clock Dials • Magnetic Boards • Flannel Boards • Peg & Peg Boards • Jig Saw Puzzles • Ironing Boards • Stoves • Sinks • Refrigerators • Dutch Cabinets • Easels • Portable Black Boards • Black Board Erasers • Basket Bottoms • Colored Wood Beads • Window Poles

Send for  
Manual for  
Teaching with  
Counting  
Frame by Dr.  
Irving Allen  
Dodes.

**DAINTEE TOYS, INC.**

230-C STEUBEN STREET, BROOKLYN 5, N. Y.

### "The Lustre that Lingers"

**DOLCOWAX**  
The lustrous,  
non-scuff FLOOR WAX  
that outlasts them all

DOLCOWAX spreads swiftly on large floor areas where in addition to appearance, safety and durability are major considerations. Premium quality DOLCOWAX is a money saver because it gives non-scuff protection longer. DOLCOWAX second-coats beautifully without crawling. Easy to apply on linoleum, cork, asphalt tile, mastic, rubber, vinyl or sealed wood flooring.

For free sanitary survey  
of your premises consult  
your Dolge service man.

**Dolge**  
WESTPORT, CONNECTICUT





**3-IN-1  
LIFETIME  
EFFICIENCY**

**FLEX-MASTER**

## 6 STUDENT DRAWING TABLE

Manufacturers of  
Lifetime  
Steel Blue  
Print Filing  
Cabinets,  
Drafting  
Tables,  
Tracing  
Tables, etc.

It's a LIFETIME\* STEEL DRAWING TABLE . . . a BOARD STORAGE UNIT . . . a TOOL STORAGE COMPARTMENT. Equipped with selected soft wood adjustable top with zinc plated steel and cleats. Large all-steel center drawer; 6 master-keyed individually locked tool drawers. Drawers operate smoothly on nylon glides. Holds 6 boards up to 20" x 20". Rigid welded steel construction.

Baked hammertone grey enamel finish. 37" high. Many board sizes. Also available with steel or hardwood tops.

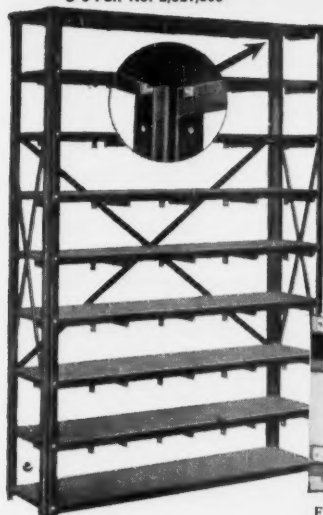
WRITE FOR CATALOG; DEALER INQUIRIES INVITED

**STACOR EQUIPMENT CO.**

477 Troy Avenue • Brooklyn 3, New York

## NEUBAUER "TWIN-POST" Gym BASKET RACK

U S Pat. No. 2,621,800

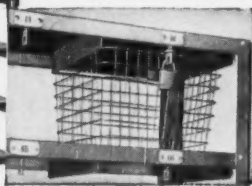


We also make Neubauer "Twin-Post" shelving in range of sizes. Write for literature.

### Rigid Corner Posts— Saler Recessed Hasps

The Neubauer "TWIN-POST" corners are actually 2 posts with 3 strong corners (see inset circle). They keep the whole basket rack rigid and in line.

Note below how dividers guide and separate baskets and how hasp and padlock are nearly recessed inside shelf edge. Eliminates danger of cuts and bruises.



**FREE ESTIMATES** — Neubauer gym Basket Racks are made in capacity desired for any size basket and can be equipped with casters. Olive green or airline grey. Special colors available.

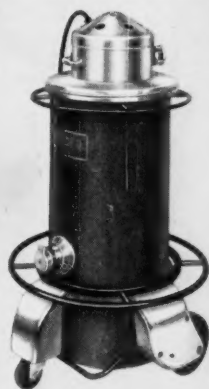
Inquiries invited from school supply dealers.

**NEUBAUER MFG. CO.**

539 Lowry Ave. N.E.  
Minneapolis 18, Minnesota

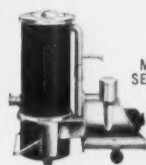
# SPENCER

## VACUUM CLEANERS



SPENCER P118 7/8 H.P.

**GET  
MORE  
DIRT**

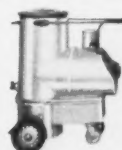


MULTI-VAC  
SENIOR P115  
3/4 H. P.

**GET  
IT  
FASTER**



MULTI-VAC  
JUNIOR P111  
1/2 H.P.



COMMERCIAL  
P125 1 H.P.

## WITH LESS EFFORT

See Booth 162, Sanitation Show, N.Y. Caliseum, Oct. 14-16.

Demonstration proves it . . . but the reason why lies in Spencer's know-how in building vacuum cleaners especially for day-in, day-out commercial service in schools, hotels, offices, public buildings, institutions, stores, theaters.

Spencer makes a COMPLETE line of commercial portables for these services, plus a COMPLETE selection of PROFESSIONAL TOOLS for floors, walls, hand-cleaning and special purposes . . . wet or dry pick-up . . . including the time-saving Spencer DRY-MOP cleaning attachment and internal dust-bag emptying.

Spencer prices are RIGHT for tight budgets . . . check before you buy. For a copy of our popular "Guide to Easier Cleaning," write Dept. NS.



4SP56A

THE SPENCER TURBINE COMPANY • HARTFORD 6, CONNECTICUT

**SPENCER**  
HARTFORD

## What's New ...

### head of the class...



**Arlington**

for anywhere in the classroom  
you can always count on Arlington  
for seating equipment at its best



Engineered to meet every requirement of the modern classroom, the No. 552 Move About is built to withstand hard wear and to be surprisingly free of maintenance problems year after year. Features include: adjustable desk top... safe, slam-control friction hinges, spacious book compartment, and noiseless 90° swivel seats. Sizes for all age groups. Also available in study top model.

Send for free Catalog No. 56... complete information about Arlington seating equipment for every classroom need.

#### ARLINGTON SEATING CO.

Arlington Heights, Illinois

... a dependable source of quality  
seating equipment for over 50 years

### Body-Contour Back Design Assures Seating Comfort

Body-Contour back design, formed by back panel and rail die in a curved shape to fit natural body lines, gives the two



new Sit-Rite folding chairs greater comfort. Model number 225 is available with 5-ply birch and maple seat while number 250 comes with an upholstered seat in a choice of colors.

Both Sit-Rite chairs are constructed of sturdy  $\frac{3}{8}$  inch tubular steel frame with cross braces of  $\frac{3}{8}$  inch tubular steel electrically welded to the frame. Non-marring beige rubber feet are tightly secured over dome glider feet and will not loosen in use yet may be easily replaced. The new folding chairs are offered in taupe or gray chipproof baked enamel finishes. Thompson Mfg. Co., Ada, Oklahoma.

For more details circle #301 on mailing card.

### Salvajector Unit Scraps and Discharges Waste

A combination unit that removes scraps from tableware, pre-washes it, and then disposes of the food waste in a single operation is offered in the new model of the Salvajector. The unit can be converted almost instantly for use as a food grinder only for the disposition of food waste during preparation. The food disposer is a new higher-capacity unit that is non-clogging, due to the new shredding action. It has a capacity of up to 120 gallons of waste per hour.

The new unit is easy to install and maintain, requiring only a single, yearly lubrication. Designed to handle the toughest kinds of food waste, including fish heads, fowl entrails, corn cobs, paper milk cartons and cooked and uncooked bones, the new Model HK Waste-X-It has a large diameter feed chute which handles leafy waste. The Salvajector Co., 118 Southwest Blvd., Kansas City 8, Mo.

For more details circle #302 on mailing card.  
(Continued on page 202)

### tops in class

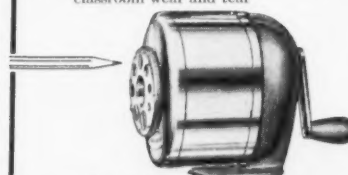
#### BOSTON KS

efficient—30 hard-steel, deep-milled cutting edges cut swiftly and neatly—BOSTON pencil stop prevents waste

rugged—strong, die-cast frame and steel rack—nickel-plated steel receptacle

adaptable—snap guide takes 8 pencil sizes

dependable—guaranteed 1 year—even against classroom wear and tear



specify BOSTON KS



**BOSTON**  
PENCIL SHARPENERS

FREE!

School report book on pencil sharpener care, selection and use in schools.

C. HOWARD HUNT PEN CO.  
Camden 1, N. J.

Also mfrs. of SPEEDBALL pens and products

**IS THIS  
YOU?**



*They have such refined and delicate palates that they can discover no one worthy of their ballots, and then when someone terrible gets elected, they say, "There, that's just what I expected!"*

—Ogden Nash

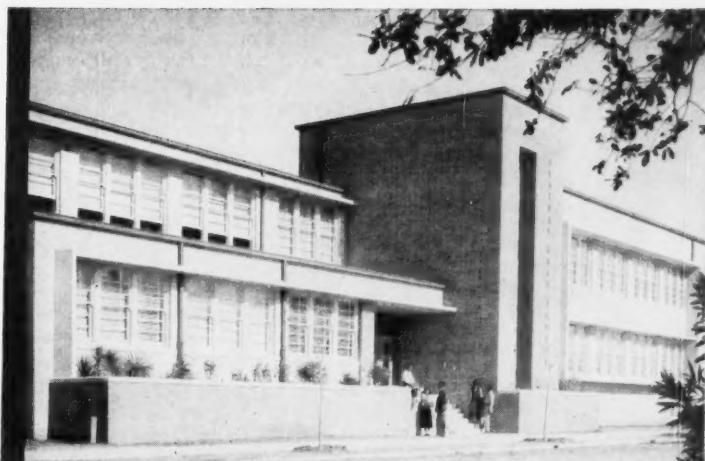
**GET READY, by being registered.**

**GET SET, by knowing what you're voting for. Then—GO VOTE!**

Published as a public service in co-operation with The Advertising Council

to rate **A** in administration

## SCHOOL OFFICIALS SELECT "CRUISING SPEED" BOILER OPERATION



(above) CENTRAL HIGH SCHOOL, GALVESTON, TEXAS

Architects: Preston M. Geren, Fort Worth, Texas;  
R. R. Rapp, Galveston, Texas  
Engineer: Yandell, Cowan & Love, Fort Worth, and  
Dallas, Texas

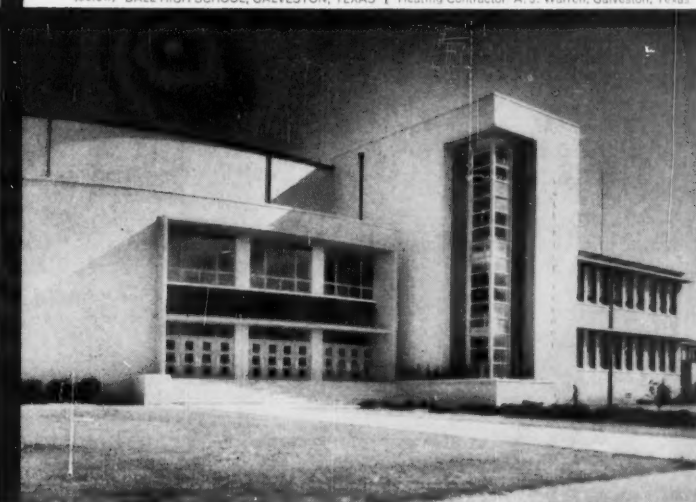
(below) BALL HIGH SCHOOL, GALVESTON, TEXAS

Heating Contractor: A. J. Warren, Galveston, Texas



Kewanee Type "C" Boiler  
used in Ball and Central  
High Schools, Galveston,  
Texas

**KEWANEE**  
reserve plus rated



■ The same exacting requirements that apply to business apply to operating today's modern schools. So authorities of two outstanding high schools in Galveston, Texas, accepted the expert advice of architect, engineer and contractor to install Kewanee Reserve Plus Rated Boilers. At Ball High and Central High, seven Kewanee Type "C" Boilers keep classrooms, multi-purpose rooms and laboratories at just the right temperature. Kewanee Reserve Plus Rated Boilers usually operate at "cruising speed," but they provide 50% extra built-in power to meet the demands of emergen-

cies, and expansion . . . a vital necessity as school enrollments grow. Rated on nominal capacity, they are not subject to the stress and strain of boilers that constantly operate at top speed. Result: lower operating and maintenance costs. Galveston School officials also selected Kewanee Boilers because of Kewanee's long-standing reputation for "personalized" service. For today's needs and tomorrow's growth—to rate an "A" in Administration—select Kewanee Reserve Plus Rated Boilers for your school buildings. AMERICAN-STANDARD, KEWANEE BOILER DIVISION, 101 Franklin St., Kewanee, Ill.

**AMERICAN-Standard**

KEWANEE BOILER DIVISION



## What's New ...

### Craig Viewer for Previewing Films

Instructors and coaches can preview new films and become acquainted with



the subject matter in minimum time with the new Craig Viewer, illustrated, or the Craig Projecto-Editor. Films are previewed without sound, a 15 minute film being run through in three to four minutes. The quick preview permits better presentation by the instructor or coach and a more stimulating introduction. The large, bright picture projected on the built-in screen is easy to see, even in fully lighted rooms, and viewing is done comfortably seated at a desk.

The Craig Projecto-Editor comes complete with Viewer, Take-up and Rewind Spindles and Arms, Master Splicer, Film Cement and Carrying Case, making it

possible to edit pictures before showing if desired. The viewer is available separately for previewing without editing. **The Kalart Company, Inc., Plainville, Conn.**

For more details circle #303 on mailing card.

### Silent Surface on K-lite Chalkboard

A sheet of plastic and glass fiber makes up the new green K-lite chalkboard which is said to have a silent surface. The surface is soft, which eliminates chalk squeal and reduces glare, thus making it easy to read material from any place in the classroom. The new board is also available in other colors and in sizes up to 12 by 3½ feet. It is low in cost and easily installed without the use of special tools or skills. Monsanto Plastic is used in the new board. **Kessler Products Co., Inc., 4521 Lake Park, Youngstown 12, Ohio.**

For more details circle #304 on mailing card.

### Reduced Maintenance on VP Utensil Washer

The new Model VP Panhandler is a greatly improved pan, pot and utensil washer. The vertically mounted immersion type pump with submerged suction has been added to the efficient operation of the earlier Model CP. The

new pump prevents leaking, dripping packing glands and mechanical seals.

The loading heights of the new model have been lowered to 36 inches, the same as for wash sinks and similar equipment, making loading and unloading easier, faster and requiring less lifting. The high-pressure washing system with hold-down grid assures complete washing from above and below as well as the sides for thorough cleaning and rinsing. Both operations are



handled by an automatic timer. The new model is available in white with stainless steel door or in all stainless steel. **The Alvey-Ferguson Co., Oakley Station, Cincinnati 9, Ohio.**

For more details circle #305 on mailing card.

(Continued on page 204)



Model 50 MBW

**your school deserves  
the finest seating ...  
and the finest is—**

# Griggs

**... IN AUDITORIUM OR CLASSROOM**

Model 786



# GRIGGS

**Equipment  
Inc.**

**Belton, Texas**





from the **classroom**



to the **gymnasium**

## **KENFLEX** floors cut maintenance costs

Constant traffic of scurrying feet demands durable, easy-to-maintain floors for schools...and sturdy KenFlex fills the bill. That's because KenFlex vinyl is blended with tough asbestos fibers for hard usage with minimum maintenance through years of service. Its smooth, non-porous surface resists dirt and grime...withstands spilled fats, oils, drugs, alcohols and

foodstuffs. KenFlex colors won't wear off. Compared to many floors that scratch and soon become pitted, KenFlex costs less, stays clean and new looking with minimum care and effort. For full details on KenFlex and other long-wearing Kentile, Inc. Floors, contact the Kentile Flooring Contractor listed under FLOORS in your Classified Telephone Directory.

**KENFLEX**...by the makers of **KENTILE FLOORS**  
VINYL ASBESTOS TILE®

COPYRIGHT 1956 KENTILE, INC., BROOKLYN 15, N. Y. \*REG. U. S. PAT. OFF.

**KENTILE \* KENCORK \* KENRUBBER \* KENFLEX \* KENFLOR \* KENROYAL**

## What's New ...

### Reach-In Refrigerator Has Interchangeable Interior

Interchangeable interiors that are adjustable on one inch centers are the feature of the new Vimco Model RS-40-S Reach-In Refrigerator. Any combination of pan slides, stationary or pull-out meat rails or shelves and refrigerated drawers can be accommodated in the new model. Interior accessories are changed quickly without the use of tools. Ball bearing pull-out shelves permit easy access to items stored at the rear and give increased usable space in the refrigerator.

The RS-40-S has all-metal construc-



tion, automatic self-defrosting, automatic interior lighting and a sanitary bottom which is easily wiped clean. Slide-out compressors facilitate servicing in the units which have a capacity of 40 cubic feet. All interior corners are coved, ground, welded and polished. All doors are equipped with built-in cylinder locks and heavy die-cast handles. Victory Metal Mfg. Corp., Plymouth Meeting, Pa.

For more details circle #306 on mailing card.

### Drinking Water Dispenser Designed for Children

A miniature drinking water cooler which is completely safe and sanitary is offered in the Cooler-Tot for use by kindergarten and primary grade children. The inexpensive unit requires no service



and is designed for easy connection to any standard water cooler or ordinary water outlet. It is sturdily constructed to withstand the hardest use and contains no motor or internal operating mechanism.

The cabinet is 31 inches high, making it easily accessible to small children. It is finished in gray hammertone enamel. The Cooler-Tot cabinet is equipped with easily cleaned white, stainproof vitreous china top and chrome drain plate. The sanitary, angle-stream, splashproof bubbler is chrome plated and is operated by slight pressure. The stainless steel base serves as a durable scuff-proof kickplate. Sunroc Corporation, Glen Riddle, Pa.

For more details circle #307 on mailing card.

- Effective teaching aids for all grades.
- Sets up a carefully planned buying program. Saves money.
- Markable-Kleenable surface on globes and maps an exclusive Cram development. Mark on —Rub off.

### THE GEORGE F. CRAM CO. INC.

730 E. Washington St., Indianapolis 7, Ind.

NS-106

- ☐ YES, I want to know more about Cram's Graded Program. Send Cat. 88-B.
- ☐ Have Cram Man call and make a FREE survey of our Teaching Aids.

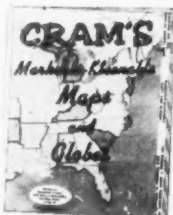
Name \_\_\_\_\_

Name of School \_\_\_\_\_

Street \_\_\_\_\_

City \_\_\_\_\_

State \_\_\_\_\_



### Portable Baseball Backstop Is Light in Weight

The new Jamison steel portable baseball backstop provides a sturdy eight by eight screen, yet weighs less than 250 pounds. The unit moves easily on five inch rubber-tired casters when grasped by the center of the rear tie bar. Backstop frames and tie bars are constructed of 1½ and 1⅝ inch galvanized standard weight steel pipe and the wire fabric is nine gauge by two inch mesh. Jamison Mfg. Co., 880 S. Mettler St., Los Angeles 3, Calif.

For more details circle #308 on mailing card.

(Continued on page 208)

# Ready or not...

## HERE WE COME!

### BE READY...

*help meet growing enrollments with*

# VICTOR

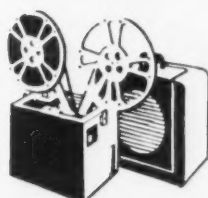
## 16mm and Micro-Projectors



Tight teaching schedules call for a projector that's highly portable, quickly set up, and easily operated... a VICTOR projector! These qualities plus Victor's protective Safety Film Trips make Victor's a favorite with teachers and school ad-

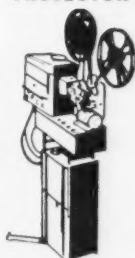
ministrators alike. Victor's brighter picture (38% more light on the screen), and clear, undistorted sound insure impressive delivery of the film lesson.

#### VICTOR SOUND PROJECTORS



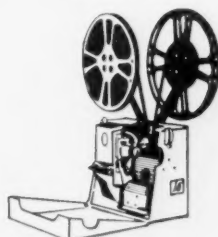
Available in three standard models to meet all audience size requirements: the Classmate 4, Assembly 10 and Sovereign 25. All models have 3-spot film threading, fingertip control panel.

#### VICTOR ARC PROJECTOR



A Portable arc projector that meets the needs of your largest assemblies. Supplies 1600 lumens on the screen, 25 watt amplifier output. Full hour show with one set of carbons.

#### VICTOR SILENT 16



A first-string aid for the coaching staff, this projector features rheostat speed control, 2000-foot reel capacity, and single switch reverse as standard equipment. Takes any wide screen lens.

#### VICTOR MAGNASCOPE V200



For group viewing of microscope slides and specimens. Enlarges, projects on wall screen or tabletop. Safe for all live and liquid specimens. Two models available. Wherever microscopes are used, Magnascope has great group study applications.

### SEND FOR LITERATURE TODAY!

SEND FOR FREE FOLDER TODAY

## VICTOR

*Animatograph Corporation*

Dept. A-106, Davenport, Iowa, U. S. A.  
NEW YORK, CHICAGO

Quality Motion Picture Equipment Since 1910

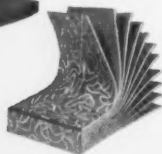


## TABLE TOPS WITH A DIFFERENCE

**JOHNSON**  
world's  
toughest  
TABLE TOPS

They're **SUPER-BONDED** by the exclusive **JOHNSON** process—and that means matchless beauty, super-smoothness, longest wear, highest sanitation and complete protection against marring. Widest selection of edging styles and plastic materials. Write for the full details that prove **JOHNSON** superiority.

Exclusive  
**SUPER-BONDED**  
9-PLY  
Construction



You can see the superior difference in the surface, in the edges and inside

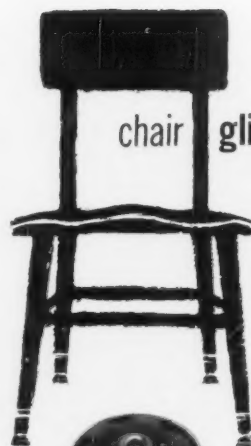
**FREE**

WRITE FOR  
CATALOG

**JOHNSON PLASTIC TOPS, INC.**

69 North Street, Dept. r-610  
Elgin, Illinois

**FORMICA**



chair glides worn out?

replace with rugged

**sphinx**

**NOISELESS CHAIR GLIDES**

Built for the classroom, built to last! Let us show you why. Send now for **FREE** sample glide, descriptive literature, complete price list. There's a big difference in Sphinx.



Sphinx | strong • silent • lasting

**sphinx** CHAIR GLIDE  
COMPANY

P.O. BOX 295 FULLERTON, CALIFORNIA



## SUPERIOR SCHOOL FURNITURE

Construction of selected Appalachian kiln-dried Beech. Desk units with mortise and pegged tenon; chairs with spiral-grooved dowels and rigidly glued corner blocks. In Natural, Warmtone, or School Brown. Line also includes Movable Chair Desks, Tables, Tablet Arm Chairs, and Teachers Desk.

Also available with plastic surface.

Write for name of authorized distributor in your state.

**WILLIAMS & BROWER, Incorporated**  
SILER CITY • NORTH CAROLINA



## FLAGS FOR SCHOOLS

**U.S. AND STATE FLAGS**

### DETTRA FEATURES

- Famous "Bulldog" Bunting
- Long-Lasting "Dura-Lite" Nylon
- Beautiful, lustrous "Glory Gloss"
- Decorations
- Flag Accessories

ASK YOUR DEALER OR  
WRITE DETTRA FOR  
DETAILED DESCRIPTIVE  
LITERATURE

Dettra—flagmaker to the Nation for 50 years, offers American flags in a wide variety of styles, sizes and materials... ideal for schoolroom, assembly hall, playing field.

★ ★ ★ ★ ★ ★ ★ ★ ★ ★  
★ ASK ABOUT ★  
★ DETTRA'S ★  
★ COLOR-SOUND FILM ★  
★ "OUR U.S. FLAG" ★  
★ A wonderful way to tell ★  
★ the story of the flag. ★  
★ ★ ★ ★ ★ ★ ★ ★ ★ ★

**DETTRA FLAG COMPANY, INC.**  
Dept. N, Oaks, Pa.  
(Within sight of Valley Forge)



# 4 excellent reasons why

## A Switch TO IBM ELECTRICS IS THE RIGHT MOVE TO MAKE !



### e<sup>ff</sup>ort-saving...

The IBM Electric makes it possible to simplify or eliminate complicated stroking and carriage drills in typing classes. Therefore, over-all typing techniques can be perfected more rapidly and easily—students become proficient typists faster!

### e<sup>ff</sup>icient...

The IBM Electric gives every school reliable, continuous operation...allowing classes to fulfill the schedule set for them. And because the IBM cuts down on preliminary drills, more time can be spent on valuable instruction in typewriting production!

### e<sup>co</sup>nomical...

Your IBM representative can show you—in dollars and cents—the surprisingly low per-student cost of a switch to the IBM Electric. This cost is based on the longer, better IBM performance, and the value the IBM retains through the years.

### e<sup>nd</sup>orsed...

In the great trend to electrics now taking place in modern business, the IBM is the favorite electric typewriter by far! Therefore, it is most practical to train students on the typewriter they will most likely use in future jobs—the superb IBM Electric!

**IBM****ELECTRIC  
TYPEWRITERS**

—OUTSELL ALL OTHER ELECTRICS COMBINED!

## What's New ...

### Portable Scaffold Benches Are Strong and Lightweight

Light weight and easy folding are features of the new Goldblatt portable



steel scaffold benches for maintenance and rehabilitation work in the school. They will hold up to 500 pounds of weight when set up, yet fold down to fit in small space and weigh 25 to 34 pounds, depending on size. One maintenance man can fold and carry the benches from room to room.

Unusually lightweight aircraft alloy steel tubing is used in the construction of the benches. The legs telescope to give adjustable heights from 24 to 46 inches on the four foot model and from 20 to 36 inches on the six foot model. The design gives the platforms strength and the foolproof locking device adds to the safety. Goldblatt Tool Co., Dept. AB, 1910 Walnut St., Kansas City 8, Mo.

For more details circle #309 on mailing card.

### Classroom Sinks of Stainless Steel

The new line of Just Classroom Sinks cannot chip or crack as they are formed of stainless steel. The fully welded, seamless construction gives permanence to the sinks and the rounded interior corners facilitate cleanliness and sanitation. Flanges and interior surfaces are hand polished with the underside thoroughly sound deadened.

The sinks are available in various sizes and models and can be used for lower grades in elementary schools for drinking fountains and as wash-up areas after craft work. They are also suitable for secondary schools in science, art and home economics departments and in lunchrooms. They are furnished with either stainless steel crumb cup strainers or chrome plated brass flat strainers. Just Mfg. Co., 9233 King Ave., Franklin Park, Ill.

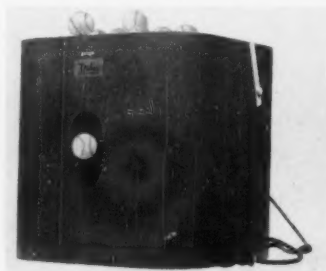
For more details circle #310 on mailing card

### Pitching Device for Batting Practice

The Dedoes Automatic Batting Practice Machine is a simple, inexpensive pitching device designed to permit players to improve their ability by practicing batting throughout the year. It is inexpensive and simple to operate and

plugs into any standard electric outlet. The machine is safe to use, pitches various sized, harmless balls at regulation distances, and throws eight or nine balls per minute. It can be easily adjusted to throw fast balls, slow balls or curves to simulate actual pitching.

The machine is available in three models: the Varsity, with heavy gauge steel case, which throws regulation baseballs, tennis balls, sponge rubber balls, soft balls and inflated rubber balls; the Collegiate Model, in 18 gauge steel case, which pitches sponge rubber balls the size of golf balls, and the Prep Model (illustrated) especially designed for the



younger baseball player, which throws harmless 1½ inch diameter balls and may be set up in a recreation room or other small area. Dedoes Industries, 2070 W. Eleven Mile Rd., Berkley, Mich.

For more details circle #311 on mailing card.

(Continued on page 210)

**WELCOME**

**Roll Out the MAT!**

Protect Life, Limb and Property

**EDWARD DON & COMPANY**

**MATS Lower Maintenance Costs**

EVERY TYPE OF MAT (and matting) to prevent slipping and falls and to protect carpets and floors is available at DON. Rubber, composition, "Shad-O-Rug," steel, wood, cocoa fiber—solid, perforated, links, etc. SEND FOR SPECIAL ILLUSTRATED FOLDER.

DON is headquarters for EQUIPMENT, FURNISHINGS and SUPPLIES for hospitals and other institutions. Every mat, like all the other 50,000 items, is sold on a guarantee of satisfaction or money back.

Ask your DON salesman or write to Dept. 16

**EDWARD DON & COMPANY**  
GENERAL HEADQUARTERS—2201 S. LaSalle St.—Chicago 16, Ill.  
Branches in MIAMI • MINNEAPOLIS • ST. PAUL • PHILADELPHIA • CAMDEN

## cut straw costs in half ...

### It's as simple as A-B-C ...

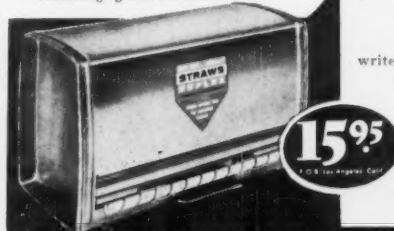
School Cafeteria Directors of Food Services, Supervisors and Managers *know best!* ... that's why so many schools from coast to coast save thousands of dollars each year with the new hygiene-approved, all-stainless-steel, DUPLEX "two-way" Straw Dispenser, eliminating straw-wrapper annoyance and clean-up labor costs.

Three cases of *unwrapped* straws, when compared with costly wrapped straws, more than pay for two DUPLEX "two-way" Straw Dispensers. The savings earned on straws, from then on, will more than help pay for that much needed extra cafeteria equipment.

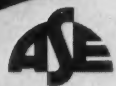
DUPLEX is *unconditionally* guaranteed.



write for FREE literature



**DUPLEX STRAW DISPENSER CO.** 511 N. La Cienega Blvd. Los Angeles 48, Calif.



# STEEL FURNITURE AND LOCKERS

## MODERN IN STYLE . . . BUILT FOR SERVICE



SINGLE-TIER LOCKERS



DOUBLE-TIER LOCKERS

BOX LOCKERS



No. 6647 TEACHER'S DESK

No. 6276 LIBRARY TABLE

No. 810 UTILITY CHAIR

### ASE Quality — Cheaper By The Year As The Years Go By

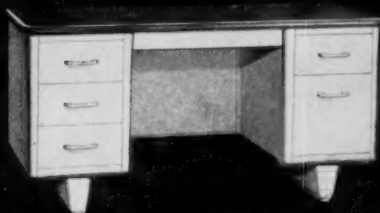
ASE Steel School Furniture keeps that "like-new" look year after year. Quality built for service and efficiency. Withstands the wear and tear of youthful activity. Bonderite treated to assure a lustrous permanent finish . . . anchors paint to metal, provides a corrosion-resistant surface. Lastingly beautiful and always in style. For classrooms, offices and libraries. Lockers for halls, locker rooms, field houses. Let us assist you in your planning. Write for information today.



No. 3487 STORAGE CABINET



No. 5401 FILE



No. 6629 PRINCIPAL'S DESK



No. 835 PRINCIPAL'S CHAIR



No. 840 Secretary's Chair



No. 540 Drafting Chair



Blueprint File



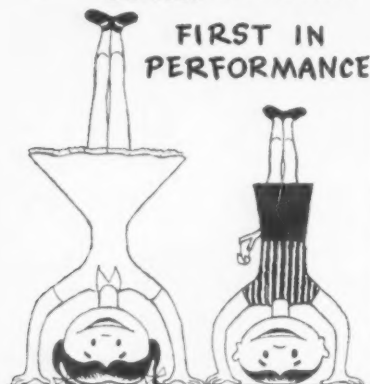
There's an ASE dealer near you

**ALL-STEEL EQUIPMENT INC.**

Aurora, Illinois

# Claridge

## CHALKBOARDS and CORK Bulletins



### FIRST in FIRSTS!

Claridge continues first with improvements. Top designers and engineers experiment constantly. Finest materials, time tested production methods bring you the best at surprisingly low cost.

**Special Colors:** Send color sample and boards will match your decor!

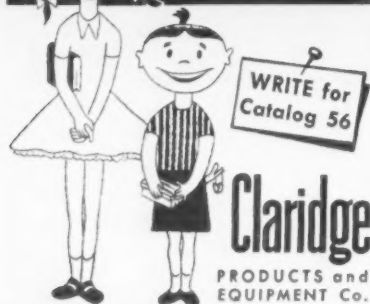
**GRAPHOLITE.** Low price, good quality. Fine performance, all types of buildings.

**DURACITE.** Guaranteed for life of building.

**ASBESTOCITE.** For long dependable service.

**VITRACITE.** Finest vitreous porcelain enamel chalkboard.

Claridge is fully equipped to meet the most exacting requirements in Chalkboards and Cork Bulletins.

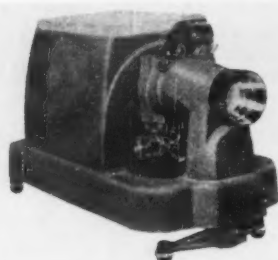


Dept. 306, 6731 Olmsted, Chicago 31

## What's New ...

### Projector Designed for Filmstrips and Slides

A combination auditorium projector has been engineered to project both



35 mm filmstrips and two by two slides. Viewlex Model V-1000 C handles both single and double frame filmstrips for vertical and horizontal projection, and two by two and bantam slides. Only one turn per frame, whether single or double, need be made with the new button device.

The new model projects bright, sharp images, yet stays cool in operation by the new system of pressurized air cooling. The cooling fan lies in a vertical position and draws cool air from the front of the projectors, passes it over the film plane, condensing lenses and over the lamp and expels it through special side louvers. The projector is equipped for individual front leg level-control. Viewlex Inc., 35-01 Queens Blvd., Long Island City 1, N. Y.

For more details circle #312 on mailing card.

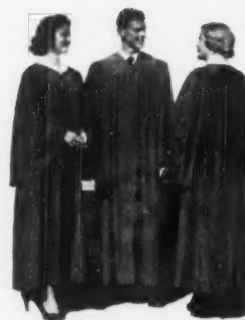
### Commercial Vacuum Cleaner for Dry Pick-Up

A capacity of two-thirds bushel of dirt makes the new Viking vacuum cleaner



effective as a furnace cleaner as well as for all institutional dry pick-up work. It is priced for low cost application and powered by a 3/4 h.p. AC/DC motor. Mounted on four three inch ball bearing casters, it is moved without excess effort. The compact size makes the Viking easily stored and it is adapted to all vacuum operations through use of the complete selection of tools available. Kent Company, 736 Canal St., Rome, N.Y.

For more details circle #313 on mailing card.  
(Continued on page 212)



*Music in color*

... is beauty in all things.

New choral robes in color sharpen the interest for all, enriches the effect, and add a sparkle to every performance.

MOORE materials, available now, in colors that remain richly colorfast for their long, fabric-life. New process, solution-dyed Chromspun® yarns, woven by Cohama Fabrics for MOORE—for ease in care, years of wear, resistance to wrinkling and easy color matching as your choir gains more members. Good news indeed, for choral groups everywhere.

Write your nearest MOORE office for catalogs and swatches. Fill out and send in the coupon below ... mail to Department N17.



☐ Send catalog of Robe Styles and Fabric Selector containing swatches for color and material.

☐ We may need approx. .... Robes for:  
☐ Adults ☐ Children

The color we like is: .....

Delivery required by: ..... (date)

☐ Have representative (with samples) phone for appointment.

**E. R. MOORE CO.**

932 Dakin St., Chicago 13, Ill.

268 Norman Ave., Brooklyn 22, N.Y.

1908 Beverly Blvd., Los Angeles 57, Calif.



A before and after  
story in pictures...



North Elementary School, Lansing, Michigan



## Modernize... one room at a time

Desirable as it might be, the answer to today's demands for classroom space is not always the new building, newly equipped. Many existing facilities can be made to serve for years to come through the addition of carefully selected modern equipment.

And... modernization need not be a burden on the school budget. Brunswick furniture and movable cabinets, for example, can be added one room at a time

at your convenience during the school year. Your first room, Brunswick-equipped, goes a long way toward bringing your older building up to date.

One room or a complete school, Brunswick furniture brings you comfort, color, versatility and flexibility that make a unique contribution to the process of learning. Write: The Brunswick-Balke-Collender Company, 623 S. Wabash Avenue, Chicago 5, Illinois.

JUST ONE LINE CONTINUES TO SET THE PACE... IT'S

*Brunswick*

## What's New ...

### Suction Cleaners in Heavy Duty Models

Powerful cleaning units for wet and dry pick-up are available in the Super Model LW-12 and MW-14. The heavy duty suction cleaners are designed for any institutional cleaning task and are small, compact, quiet, readily mobile units. The Super Model LW-12 is a small, low-priced machine for wet and dry pick-up, featuring the Super push-button hose connection lock, built-in float control and dry air motor cooling. The Super Model MW-14 has the same features plus large fixed rear wheels



which eliminate side travel, two front ball bearing casters and a transport handle, making it easy to take the unit from place to place, even up and down stairs. Both new models have wrap around solid rubber bumpers around the base to protect walls and furniture. They are mounted on ball bearing swivel casters and operate at minimum noise level.

A third new model, the Super Model BP-2, is a large machine with all of the Super features but designed for big capacity, extra heavy duty wet and dry suction cleaning. It has extra large semi-pneumatic fixed rear wheels and is available with either stainless steel or enameled steel container. **The National Super Service Co., 1945 N. 12th St., Toledo 2, Ohio.**

For more details circle #314 on mailing card.



Dage TV camera, operated by student, picks up scene for transmission in closeup to nearby classroom.

In classroom, the teacher refers a question over the talkback microphone to a student panelist, questions are answered immediately.



### At Evanston H. S. TV Workshop



In control room, a student decides which of three pictures on Dage monitor shall be transmitted to the classroom, gives directions to cameramen over his mike and answers questions that come in on his headphones. Full-time TV engineer, at left, supervises student operators and provides maintenance.

**Dage closed-circuit television** equipment was chosen for the Evanston Township (Illinois) High School. Dage TV will be used to teach English, speech and typing courses this year. To aid the teachers in this project, student production crews were trained in the use of Dage equipment during the summer TV workshop at Evanston H. S.

**Dage TV opens** exciting possibilities in closed-circuit television instruction. An instructor can teach his special subjects to several classes at the same time. A close-up view of lab experiments can be assured for each student. Students may stay in classrooms and view "assembly" speakers on their TV screens. Get the facts about Dage TV ... a new dimension in education. Write Dept. 310 for information.



**DAGE TELEVISION DIVISION  
MICHIGAN CITY, INDIANA**

**'A Thompson Product'**

In Canada: Distributed by Rogers Majestic Electronics, Limited, Toronto, Ontario  
OUTSIDE NORTH AMERICA: Write C. O. Brandes, Inc., 4900 Euclid Avenue, Cleveland, Ohio

### Quick and Easy Lettering With Varigraph Device

A precision lettering instrument for making signs, posters, slides, labels,



charts, awards and other items is offered in the new Super Varigraph. The device employs new light metal templets which are individually engraved and easy to read. Depressions fitting into a tension spring hold the templet steady during the lettering operation. Anyone can produce finished lettering art with the new device at minimum cost. The Varigraph works against a T-square or other straight edge for horizontal line-up of lettering, and is adaptable to either right or left-hand operation.

The Varigraph is seven by seven by 1 1/8 inches in size and weighs one and one-quarter pounds. Two dials on the device adjust the height and width of the lettering required. More than 600 sizes and shapes of the letters can be made from one templet, making infinite variety possible. It permits the production of lettering exactly fitted to the space allotted and copy can be condensed or extended by a simple adjustment of the dials. The combination of movements employed by the Varigraph is new and is the result of years of engineering research and experiment. No previous lettering experience or skill is required to get excellent results in lettering with the Varigraph. **The Varigraph Company, Inc., Madison 1, Wis.**

For more details circle #315 on mailing card.

(Continued on page 214)

SURFACED INSIDE AND OUT WITH  
MAINTENANCE-FREE NEVAMAR . . .

# National Multi-Purpose Cabinets

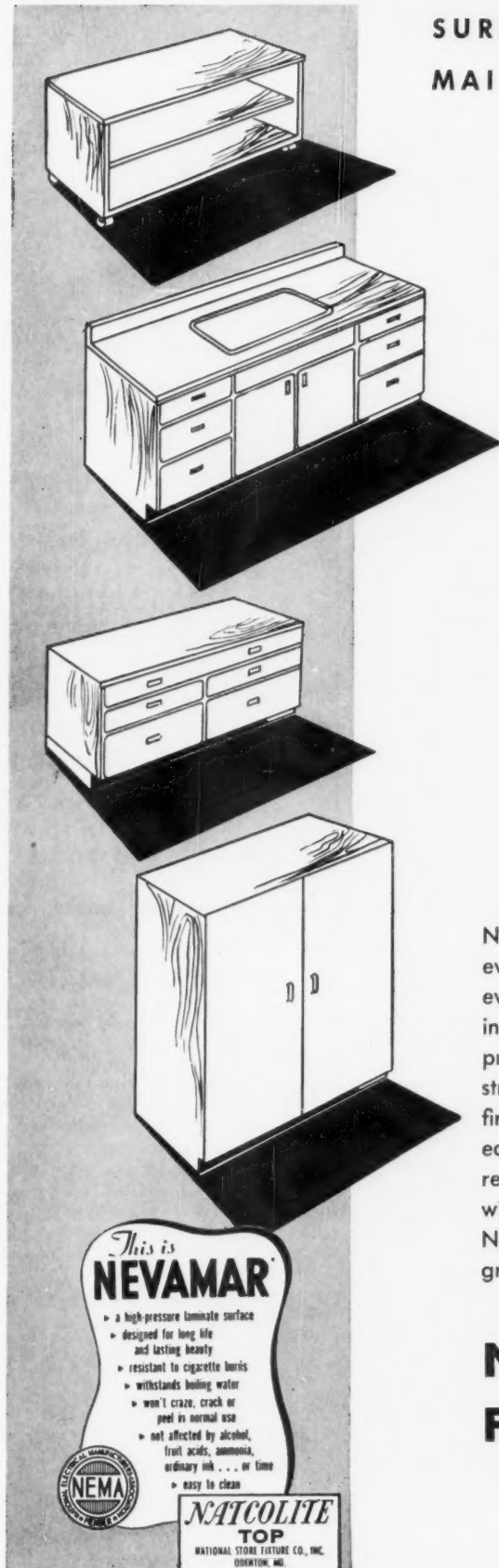
A COMPLETE LINE OF  
INTERCHANGEABLE UNITS THAT  
PROVIDE EVERY TYPE OF  
STORAGE FACILITY AND  
IDEAL WORK SURFACES

National Multi-Purpose Cabinets are designed to meet every need in today's classrooms. There is a unit for every purpose and in every size. Completely surfaced inside and out with NEVAMAR, the super-smooth high-pressure laminate, these cabinets are virtually indestructible. They never need painting, never need refinishing and are completely vermin-proof. They can easily and quickly be arranged to meet every possible requirement. Every cabinet in the line is constructed with cabinetmaker precision for enduring service. The NEVAMAR surfaces are in a special honey maple wood-grain. Write for complete literature.

## NATIONAL SCHOOL FURNITURE COMPANY

*Div. of National Store Fixture Co., Inc.*

ODENTON, MARYLAND



*This is*  
**NEVAMAR**

- a high-pressure laminate surface
- designed for long life and lasting beauty
- resistant to cigarette burns
- withstands boiling water
- won't craze, crack or peel in normal use
- not affected by alcohol, fruit acids, ammonia, ordinary ink . . . or time
- easy to clean



**NATCOLITE**  
**TOP**  
NATIONAL STORE FIXTURE CO., INC.  
ODENTON, MD.

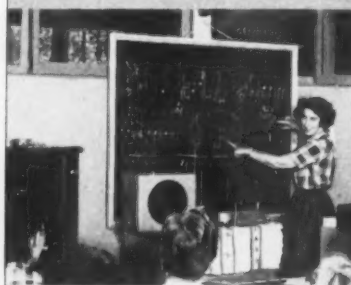


Presenting

# Califone PHONOGRAPHS

with an  
Ear to the Future...

America's Foremost  
Audio Visual Aid  
with new advances  
in design to meet  
Tomorrow's SCHOOL  
Requirements Today!



## New Features Include...

New Heights in Fidelity  
● bringing musical Realism  
to the classroom

New precision control  
● of all speeds from  
16 to 84 R.P.M.

See your CALIFONE dealer now  
for a demonstration... or  
Write for FREE catalog

DEPT. NS-4  
**Califone**  
CORPORATION  
1041 NO. SYCAMORE AVENUE  
HOLLYWOOD 38, CALIFORNIA

## What's New...

### Literature and Services

• The Herman Nelson Audivent unit ventilator designed for the heating, ventilating and natural cooling of areas such as gymnasiums, cafeterias, auditoriums, libraries and similar large capacity rooms is discussed in a new 12 page catalog released by American Air Filter Co., Inc., Louisville 8, Ky. The ultra-quiet features of the system, which is specially engineered for quiet operation, are covered as are details and specifications.

For more details circle #316 on mailing card.

• "Quiet at Work" is the title of a new 16-page booklet on acoustical materials for commercial and institutional use offered by Armstrong Cork Co., Lancaster, Pa. The booklet provides information for choosing materials for specific jobs and discusses the technical aspects of acoustical treatment in non-technical terms.

For more details circle #317 on mailing card.

• How to plan an efficient maintenance schedule for each day of the week is outlined in the new "Daily Work Planning Guide for Efficient Building House-keeping." Designed for hanging on the wall, the Guide contains 90 daily work sheets. Additional 90 day Planning Guides are available without cost. The guide was developed for use in maintenance operations for buildings of all types and sizes and is available from Advance Floor Machine Co., 4100 Washington Ave. N., Minneapolis 12, Minn.

For more details circle #318 on mailing card.

• The use of rubber flooring in school installations is graphically told by candid photographs in the booklet, "The Floor... its new role in education," available from The Rubber Mfrs. Assn., Inc., Rubber Flooring Div., 444 Madison Ave., New York 22. A series of photographs describe the day's activities of a kindergarten group and shows how the floor is an integral part of the educational program. Other typical school installations of rubber flooring are illustrated with questions and answers about rubber flooring ending the story.

For more details circle #319 on mailing card.

• Stainless steel food conveyors for decentralized and centralized food distribution systems are the subject of Catalog T-5 issued by S. Blickman, Inc., Weehawken, N.J. The 32 page booklet, fully illustrated, is a guide to purchasing as it contains complete specifications and detailed descriptions of food conveyors and various construction features of each. The complete line of food conveyors manufactured by the company includes electrically-heated all-purpose bulk food conveyors in a wide variety of arrangements, new types of central service conveyors for hot and cold foods, bulk food trucks for cafeteria service and tray and dish trucks.

For more details circle #320 on mailing card.

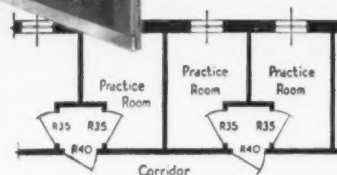
(Continued on page 216)



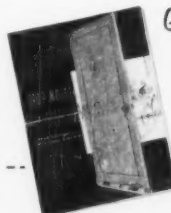
**STOP  
UNDESIRABLE  
SOUNDS**

— from room to  
room  
transmission

**STOP AIRBORNE  
SOUND WITH  
HARDWOOD  
PRODUCTS  
SOUND INSULAT-  
ING DOORS**



Isolate disturbing noise and sound in music and band rooms, gymnasiums, workshops and hallways with this nationally famous sound insulating door. Pre-measured for sound reduction, you know in advance the final noise factor. Sound Insulating Doors come in 35, 40 and 43 decibel degrees of transmission loss. Write for details or consult your architect or acoustical engineer.



Get this FREE brochure

It tells in under-standable non-technical language how SOUND INSULATING DOORS function — how sound intensity is measured and controlled.

WRITE BOX NS

**HARDWOOD PRODUCTS CORPORATION**

NEENAH • WISCONSIN

NEW YORK • CHICAGO • BOSTON • CLEVELAND

The NATION'S SCHOOLS



## *How to wash a window this clean in 23 seconds*

**SPRAY**



**WIPE**



**ADMIRE!**



Sparkling clean windows can be just that easy.

Holcomb *Window Cleaner Concentrate* does the work—not you. It takes only half as long as ordinary washing.

This quick cleaner cuts greasy deposits on contact, instantly loosens and dissolves sticky soot and dirt. You merely wipe lightly. The glass dries before your eyes . . . clear and clean. Holcomb *Window Cleaner* leaves no powdery dust, no oily film to catch fresh dirt.

Just one more thing. Holcomb *Window Cleaner* is packed double strength to save you money. Just add an equal portion of water. Then say goodbye to window dirt.

Your Holcombman will be glad to give you a demonstration

### **HOLCOMB SCIENTIFIC CLEANING MATERIALS**

J. I. Holcomb Mfg. Co., Inc., 1601 Barth Avenue, Indianapolis, Indiana  
NEW YORK • DALLAS • LOS ANGELES • TORONTO

## What's New ...

• Fiberglass products for the construction and maintenance of schools are the subject of a 28-page brochure published by Owens-Corning Fiberglass Corp., Toledo 1, Ohio. Illustrated in color, the booklet, entitled "Education Is a Physical Process, Too," carries 11 sketches, 56 photographs and two charts to help tell the interesting story. Starting with the premise that "teaching is made easier for student and teacher when both are comfortable, cheerful, alert and safe," the text discusses the place of Fiberglass products in the training of the mind.

For more details circle #321 on mailing card.

• The story of the "Flexalarm Fire Alarm System" is told in Bulletin No. F249, Flexalarm Section II, Technical, available from The Gamewell Company, Newton Upper Falls 64, Mass. The Flexalarm Manual states that "The name Flexalarm is applied to a complete line of fire alarm components designed to comply with the recommendations of the various Federal, National and State authorities concerned with the approval and operation of fire alarm facilities." The bulletin contains technical data on the entire line and its component parts.

For more details circle #322 on mailing card.

• Catalogs on Coppes Nappanee School Furniture and Equipment are now available from Coppes, Inc., Nappanee, Ind. Filed in a handy folder, the catalogs cover furniture and equipment for the school in the following categories: foods and nutrition; music and visual aid storage and shelving; clothing and textiles; home management, home nursing and child care; arts and crafts; kitchens of distinction, and supplementary accessories and equipment. Attractive colors distinguish the catalog sections, each of which gives specifications, construction and design details, drawings showing the careful, rugged construction techniques, and photographs of the items in each line, together with descriptive information.

For more details circle #323 on mailing card.

• "Weisway Cabinet Showers" are the subject of a new catalog issued by the Henry Weis Mfg. Co., Inc., Elkhart, Ind. The booklet employs full color illustrations to describe the complete line of Weis cabinet showers and rough-in dimensions, accessories, construction and bathroom ideas are also included.

For more details circle #324 on mailing card.

• An explanation of how theories of automation are being applied through new tooling developments make the 48-page catalog of manual school shop tools a valuable teaching aid. Available from Wilton Tool Mfg. Co., Inc., Shiller Park, Ill., the catalog contains a complete line of shop tools and explains new clamping tools for automation.

For more details circle #325 on mailing card.

• "Mills Movable Metal Walls provide Space Control" titles the 1956 68-page catalog issued by Mills Co., 968 Wayside Rd., Cleveland 10, Ohio. Including complete information on design and construction features with specifications and detail drawings, the illustrated catalog shows the advantages of flexible interiors for institutions and other buildings. The entire line of Mills accessories and hardware is also described.

For more details circle #326 on mailing card.

• An illustrated brochure describes the advantages and uses of the new Chip-Freeze automatic ice-maker. Available from the Cold Corporation of America, 1371-89 N. North Branch St., Chicago 22, the booklet contains distinguishing features and mechanical specifications of the Chip-Freeze equipment which is available in six colors.

For more details circle #327 on mailing card.

• Williamsburg-Created Fiberglass Draperies is the subject of the new booklet issued by Williamsburg Drapery Co., Inc., 819 W. Chicago Ave., Chicago 22. The booklet illustrates, describes and gives specifications of drapery patterns, heavy-duty stage and drapery hardware and audio-visual darkening draperies.

For more details circle #328 on mailing card.

(Continued on page 218)



### can't stop looking at Hamilton's new arts and crafts equipment!

And neither will you! This beautiful, big 64 page catalog describes Hamilton's new line of school equipment for fine and applied arts instruction . . . for a wide range of storage needs . . . for mechanical drawing classrooms . . . for school shops—all with appropriate planning suggestions.

You'll find an entirely different approach to the requirements of arts and crafts instruction—equipment that brings the very look of creativeness to your instruction centers. In the development of this broad, new

line an appealing balance has been achieved—a blending of Hamilton's detailed knowledge of school equipment needs, with an entirely new freshness of form, material and color. We think you'll find the end result attractive and well worth knowing about.

Whether your interest is in arts and crafts equipment, mechanical drawing, shop or all-purpose storage—you'll surely want to see Hamilton's new Catalog 219. Write for your copy now.



Ready for you now!  
64 pages, with full  
color illustrations  
of selected products,  
finishes and colors.  
Write today!

## Hamilton

Arts and Crafts equipment

Hamilton Manufacturing Company • Two Rivers, Wisconsin



## VIPs ride in safety here!

**Safety goes along** on every trip a Dodge school bus makes! Frame, drive line, springing and braking systems are designed and built to *protect* passengers. On every count, Dodge school bus chassis meet or exceed all safety codes recommended by the National Conference on School Bus Standards.

**Dodge costs less** to operate, too, whether you drive city or country routes! A dependable Dodge is always ready to go, stays on the job and out of the repair shop. Official records kept by one school district showed that Dodge school buses cost \$300 *less per year* to operate than other makes!



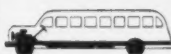
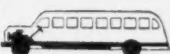
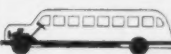
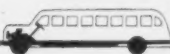
For help in selecting the school bus chassis and body that meet your requirements, see your nearest Dodge dealer. And remember, it pays to **get your Dodge dealer's deal before you decide!**



**New Town Wagon For Smaller Groups** also serves as feeder bus for larger schools. Strong body on rugged Dodge 1/2-ton truck chassis carries eight in comfort. Or seats can be rearranged to give you 60 cu. ft. of cargo space in addition to six passengers. Two separate braking systems for added safety. Famous Dodge L-head six-cylinder engine or new Power-Dome V-8.

# DODGE "Job-Rated" School Bus Chassis

School Bus Chassis for Bodies Accommodating 30, 36, 48, 54, 60, and 66 Passengers

					
MODEL GS6, GS8-153" WB 10,500 and 12,000 lbs. G.V.W. For 30 and 36 pupils.	MODEL HS6, HS8-193" WB 14,500 and 16,000 lbs. G.V.W. For 48 pupils.	MODEL HS6, HS8-217" WB 14,500 and 17,000 lbs. G.V.W. For 54 pupils.	MODEL HHS6, HHS8-217" WB 17,000 and 18,000 lbs. G.V.W. For 54 pupils.	MODEL KS8-236" WB 17,500 and 21,000 lbs. G.V.W. For 60 pupils.	MODEL KS8-254" WB 21,000 lbs. G.V.W. For 66 pupils.

## What's New ...

• A 20-page booklet on "Daylight for Schools" is available from Kimble Glass Co., Toledo 1, Ohio. The latest methods of daylighting school buildings with glass block and prismatic glass skylights are discussed. More than 40 photographs and drawings are used with the text to tell the story, which includes special information on the new Owens-Illinois Solar-Selecting glass block and the Kimble Toplite System.

For more details circle #329 on mailing card.

• Designed to acquaint communities with driver education courses, "What Everyone Should Know About High School Driver Education" is an eight-page folder issued by the Assn. of Casualty and Surety Companies, Accident Prevention Dept., 60 John St., New York 38. The leaflet describes the need and growth of driver education courses with information on teacher qualification, equipment needed, and cost and organization of an acceptable course.

For more details circle #330 on mailing card.

• Photographs of installations of inexpensive partitions in schools, offices and other buildings are shown in **Bulletin 901** released by Unistrut Products Co., 933 Washington Blvd., Chicago 7. The bulletin demonstrates the use of flexible, re-usable partitions, how they can be installed and discusses the advantages of their use in institutions.

For more details circle #331 on mailing card.

• A new catalog of tables and stools for lunchrooms and cafeterias as well as Sanidri electric hand dryers is offered by The Chicago Hardware Foundry Co., North Chicago, Ill. Entitled "Designs in Color," the catalog is printed in attractive colors as well as black and white.

For more details circle #332 on mailing card.

• **Bulletin 100** issued by Despatch Oven Co., 819 Eighth St. S. E., Minneapolis 14, Minn. covers the four redesigned models of laboratory and production ovens. The color-illustrated brochure features the new engineering, construction and control features of the "V" series ovens with information on oven types, applications, capacities and specifications for gas and electric fired ovens.

For more details circle #333 on mailing card.

• Based on the concept that everyone does not know how to sweep, the National Sanitary Supply Association, 139 N. Clark St., Chicago 2, has issued **Bulletin Board Edition #6, Sweeping Stairs**. The 17 by 22 inch illustrated poster describes the proper work methods for sweeping stairways and serves as a valuable training aid for employees.

For more details circle #334 on mailing card.

### Film Releases

"The Human Body: Circulatory System," "Careers in the Building Trades," "The Story of Citrus Fruits," "Under-

standing Fire (Exploring Science)," "Let's Measure: Ounces, Pounds and Tons," "Pints, Quarts and Gallons," "Pioneer Journey Across the Appalachians," "Eyes: Their Structure and Care," "Teeth," "Canada: Geography of the Americas," "How the Animals Discovered Christmas," all 16 mm sound, in color or black and white. "The Soviet Union: The Land and the People" in black and white. **Coronet Films, 65 E. South Water St., Chicago 1.**

For more details circle #335 on mailing card.

"The Way of a Ship" describes Mediterranean cruise, and "Jungle Search" tells story of search for oil, both 16 mm sound in color. **British Information Services, 30 Rockefeller Plaza, New York 20.**

For more details circle #336 on mailing card.

"Health Careers," 16 mm sound, black and white film covers job opportunities for health professions in various fields. **National Health Council, Health Careers, 1790 Broadway, New York 19.**

For more details circle #337 on mailing card.

Color Filmstrip Kits, "How The Indians Lived," describes the Iroquois, Dakota, Hopi, Navajo and Salish Indians. "Music Stories" and "Stories of Music Classics" for music appreciation programs. **The Jam Handy Organization, 2821 E. Grand Blvd., Detroit 11, Mich.**

For more details circle #338 on mailing card.

### FOR SCHOOL AND AUDITORIUM

SEE THIS

*All-New  
Organ*

BY

**CONN**

THE  
*Artist*... INDEPENDENT

MANUALS, 25-NOTE PEDAL BOARD



Ideal for classroom or auditorium, this new, larger organ, the ARTIST, by CONN, is the all-around favorite of those who want a really fine moderately priced instrument. Compare the tone, the "voices" and the performance—with any other organ. Choose CONN and your school will have America's Finest. CONN ORGAN CORPORATION, Department 1030, Elkhart, Indiana.



"TRIUMPH IN TONE"

#### Free BROCHURE

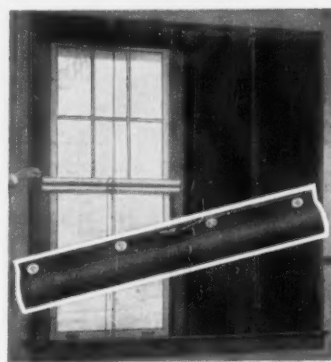
All about this great new CONN ARTIST organ. Also ask for free booklet, "How to Choose an Organ."



MUSICAL INSTRUMENT SPECIALISTS' NEARLY A CENTURY

## How Many Classrooms Will One Set of PAKFOLDS Darken?

PORTABLE  
PAKFOLDS  
SERVE  
BEST . . .  
COST  
LESS!



Portable PAKFOLDS make every room a visual education room! One set of PAKFOLDS serves throughout the building. PAKFOLDS attach instantly . . . no ladders to climb; no screws or complicated mechanisms. Available for large or small windows, in any length or width.

Write for complete information and free sample of Pakfold cloth.

To get Draper Quality . . . Specify DRAPER

**LUTHER O. DRAPER SHADE CO.**

P.O. BOX 515

SPICELAND, INDIANA



# PROD Ind

## USE THESE CARDS

(We pay the postage)

### Key

- 267 Schoolroom System  
Norman Products Co.
- 268 Darkening Draperies  
E. I. du Pont de Nemours & Co.
- 269 Shoninger "55" Piano  
National Piano Corp.
- 270 Fenlite Window Finishing  
Fenestra, Inc.
- 271 Plastic Bag Slicer Attachment  
G. S. Blakeslee & Co.
- 272 Magnetic-Optical Projector  
Eastman Kodak Co.
- 273 Acclaim Dishwashing Compound  
Economics Laboratory, Inc.
- 274 Art Desk  
Westmoreland Seating
- 275 Colored Fiberglass Fountain  
Haws Drinking Faucet Co.
- 276 Auto-Feed for Photocopier  
Peerless Photo Products, Inc.
- 277 Wireless Intercom  
Feiler Engineering & Mfg. Co.
- 278 Freezeproof Fountain  
Crane Co.
- 279 Lenscreen "825"  
Polacoat, Inc.
- 280 Tempo-Trays  
Bolta Products
- 281 Star Venetian Blind  
The Eastern Venetian Blind Co.
- 282 Coach Flasher Light  
Superior Coach Corp.
- 283 Holiday Lighting Fixture  
Day-Brite Lighting, Inc.
- 284 Translucent Vinyl Draperies  
Charles W. Rice & Co., Inc.
- 285 Dictet Recorder  
Dictaphone Corp.
- 286 Realite Luminaire  
Holophane Co., Inc.
- 287 Viscous Damped Tone Arms  
Gray Research & Development Co.
- 288 Rotary Planer  
DeWalt Inc.
- 289 Key-Punch Correction Seals  
W. H. Brady Co.
- 290 Double-Width Chair Caddy  
Midwest Folding Products



These cards are detachable and are provided for the convenience of our subscribers, and those to whom they pass their copies, in obtaining information on products and services advertised in this issue or described in the "What's New" Section. See reverse side.

October, 1956

Please ask the manufacturers, indicated by the numbers I have circled, to send further literature and information provided there is no charge or obligation.

### WHAT'S NEW

267 268 269 270 271 272  
273 274 275 276 277 278  
279 280 281 282 283 284  
285 286 287 288 289 290  
291 292 293 294 295 296  
297 298 299 300 301 302  
303 304 305 306 307 308  
309 310 311 312 313 314  
315 316 317 318 319 320  
321 322 323 324 325 326  
327 328 329 330 331 332  
333 334 335 336 337 338

### ADVERTISEMENTS

339 340 341 342 343 344 345 346 347 348 349 350 351 352  
353 354 355 356 357 358 359 360 361 362 363 364 365 366  
367 368 369 370 371 372 373 374 375 376 377 378 379 380  
381 382 383 384 385 386 387 388 389 390 391 392 393 394  
395 396 397 398 399 400 401 402 403 404 405 406 407 408  
409 410 411 412 413 414 415 416 417 418 419 420 421 422  
423 424 425 426 427 428 429 430 431 432 433 434 435 436  
437 438 439 440 441 442 443 444 445 446 447 448 449 450  
451 452 453 454 455 456 457 458 459 460 461 462 463 464  
465 466 467 468 469 470 471 472 473 474 475 476 477 478  
479 480 481 482 483 484 485 486 487 488 489 490 491 492  
493 494 495 496 497 498 499 500 501 502 503 504 505 506  
507 508 509 510 511 512 513 514 515 516 517 518 519 520  
521

NAME	TITLE
INSTITUTION	
ADDRESS	CITY ZONE STATE

## Index

### Key

- 339 Adams & Westlake Company  
Aluminum Windows
- 340 Aetna Life Affiliated Companies  
Driver Teaching Aid
- 341 Allied Radio Corporation  
Catalog
- 342 All-Steel Equipment Inc.  
School Furniture
- 343 American Bitumuls & Asphalt Compan  
Playground Surfacing Material
- 344 American Blower Corporation  
Heating-Ventilating Unit
- 345 American Crayon Company  
Chalk & Chalkboard Cleaner
- 346 American Desk Mfg. Company  
Classroom Furniture
- 347 American Floor Surfacing Machine Co.  
Floor Maintenance
- 348 American Seating Company  
School Seating.....facing page

October, 1956

Please ask the manufacturers, indicated by the numbers I have circled, to send further literature and information provided there is no charge or obligation.

### WHAT'S NEW

267 268 269 270 271 272  
273 274 275 276 277 278  
279 280 281 282 283 284  
285 286 287 288 289 290  
291 292 293 294 295 296  
297 298 299 300 301 302  
303 304 305 306 307 308  
309 310 311 312 313 314  
315 316 317 318 319 320  
321 322 323 324 325 326  
327 328 329 330 331 332  
333 334 335 336 337 338

### ADVERTISEMENTS

339 340 341 342 343 344 345 346 347 348 349 350 351 352  
353 354 355 356 357 358 359 360 361 362 363 364 365 366  
367 368 369 370 371 372 373 374 375 376 377 378 379 380  
381 382 383 384 385 386 387 388 389 390 391 392 393 394  
395 396 397 398 399 400 401 402 403 404 405 406 407 408  
409 410 411 412 413 414 415 416 417 418 419 420 421 422  
423 424 425 426 427 428 429 430 431 432 433 434 435 436  
437 438 439 440 441 442 443 444 445 446 447 448 449 450  
451 452 453 454 455 456 457 458 459 460 461 462 463 464  
465 466 467 468 469 470 471 472 473 474 475 476 477 478  
479 480 481 482 483 484 485 486 487 488 489 490 491 492  
493 494 495 496 497 498 499 500 501 502 503 504 505 506  
507 508 509 510 511 512 513 514 515 516 517 518 519 520  
521

NAME	TITLE
INSTITUTION	
ADDRESS	CITY ZONE STATE

# PRODUCT INFORMATION

## Index to "What's New"

Pages 171-218

Key	Key	Key
267 Schoolroom System Norman Products Co.	291 Safety Ramp Safety Ramp Co.	315 Super Varigraph The Varigraph Co., Inc.
268 Darkening Draperies E. I. du Pont de Nemours & Co.	292 TV Study Hall Monitor General Precision Laboratory, Inc.	316 Auditorium Unit Ventilator American Air Filter Co., Inc.
269 Shoninger "35" Piano National Piano Corp.	293 Exit Lights Curtis Lighting, Inc.	317 "Quiet at Work" Armstrong Cork Co.
270 Fenlite Window Finishing Fenestra, Inc.	294 Side-by-Side Steam Cooker The Cleveland Range Co.	318 Daily Work Planning Guide Advance Floor Machine Co.
271 Plastic Bag Slicer Attachment G. S. Blakeslee & Co.	295 Trend China Onondaga Pottery Co.	319 "The Floor" The Rubber Mfrs. Assn., Inc.
272 Magnetic-Optical Projector Eastman Kodak Co.	296 Molded Synthetic Shako Uniforms by Ostwald, Inc.	320 Catalog T-5 S. Blickman, Inc.
273 Acclaim Dishwashing Compound Economics Laboratory, Inc.	297 Lamb's Wool Fence Coater Rust-Oleum Corp.	321 "Education is a Physical Process" Owens-Corning Fiberglass Corp.
274 Art Desk Westmoreland Seating	298 Apeco Panel-Lite Copier American Photocopy Equipment Co.	322 Bulletin No. F249 The Gamewell Co.
275 Colored Fiberglass Fountain Haws Drinking Faucet Co.	299 Mohawk Lighting Fixtures Sylvania Electric Products Inc.	323 Coppes Nappanee Catalogs Coppes, Inc.
276 Auto-Feed for Photocopier Peerless Photo Products, Inc.	300 Combination Key-Control Padlock Junkunc Bros.	324 "Weisway Cabinet Showers" Henry Weis Mfg. Co., Inc.
277 Wireless Intercom Feiler Engineering & Mfg. Co.	301 Sit-Rite Folding Chairs Thompson Mfg. Co.	325 School Shop Tools Catalog Wilton Tool Mfg. Co., Inc.
278 Freezeproof Fountain Crane Co.	302 Food Waste Disposer The Salvajor Co.	326 Movable Metal Walls Mills Co.
279 Lenscreen "625" Polacoat, Inc.	303 Viewer and Projecto-Editor The Kalart Co., Inc.	327 Chip-Freeze Ice-Maker Cold Corp. of America
280 Tempo-Trays Bolita Products	304 K-Lite Chalkboard Kessler Products Co., Inc.	328 Williamsburg Fiberglass Draperies Williamsburg Drapery Co., Inc.
281 Star Venetian Blind The Eastern Venetian Blind Co.	305 Model VP Panhandler The Alvey-Ferguson Co.	329 "Daylight for Schools" Kimble Glass Co.
282 Coach Flasher Light Superior Coach Corp.	306 Reach-In Refrigerator Victory Metal Mfg. Corp.	330 "Driver Education" Assn. of Casualty & Surety Companies
283 Holiday Lighting Fixture Day-Brite Lighting, Inc.	307 Cooler-Tot Sunroc Corp.	331 Bulletin 901 Unistrut Products Co.
284 Translucent Vinyl Draperies Charles W. Rice & Co., Inc.	308 Portable Baseball Backstop Jamison Mfg. Co.	332 "Designs in Color" The Chicago Hardware Foundry Co.
285 Dictat Recorder Dictaphone Corp.	309 Portable Steel Scaffold Goldblatt Tool Co.	333 Bulletin 100 Despatch Oven Co.
286 Realite Luminaire Holophane Co., Inc.	310 Stainless Steel Sinks Juni Mfg. Co.	334 Bulletin #8 National Sanitary Supply Assn.
287 Viscous Damped Tone Arms Gray Research & Development Co.	311 Batting Practice Machine Decodes Inc.	335 Film Releases Caronet Films
288 Rotary Planer DeWalt Inc.	312 Model V-1000 C Projector Viewlex, Inc.	336 Film Releases British Information Services
289 Key-Punch Correction Seals W. H. Brady Co.	313 Viking Commercial Vacuum Cleaner Kent Co.	337 "Health Careers" National Health Council
290 Double-Width Chair Caddy Midwest Folding Products	314 Super Model Cleaners The National Super Service Co.	338 Filmstrip Releases The Jam Handy Organization

## Index to Products Advertised

Key	Page	Key	Page	Key	Page
339 Adams & Westlake Company Aluminum Windows.....	7	349 Americana Corporation Encyclopedia.....	145	359 Bay West Paper Company Paper Towel Dispenser.....	154
340 Aetna Life Affiliated Companies Driver Teaching Aid.....	173	350 Ampco Corporation Tape Recorder & Projector.....	185	360 Beckley-Cardy Company School Seating.....	168
341 Allied Radio Corporation Catalog.....	192	351 Apco Products Inc. Pencil Sharpeners.....	186	361 Bell & Howell Company Projector.....	34
342 All-Steel Equipment Inc. School Furniture.....	200	352 Arlington Seating Company School Seating.....	200	362 Bell Sound Systems, Inc. Tape Recorder.....	16
343 American Bitumuls & Asphalt Company Playground Surfacing Material.....	184	353 Armstrong Cork Company Acoustical Material.....	141	363 Blakeslee & Company, G. S. Kitchen Machines.....	107
344 American Blower Corporation Heating-Ventilating Unit.....	28	354 Audio Equipment Co., Inc. Electronic Megaphone.....	111	364 Boonton Molding Company Dinnerware.....	facing page 33
345 American Crayon Company Chalk & Chalkboard Cleaner.....	119	355 Automatic Electric Sales Corp. Telephone System.....	14	365 Bradley Washmountain Company Drinking Fountain.....	162
346 American Desk Mfg. Company Classroom Furniture.....	18	356 Barber-Colman Company Heating & Ventilating Unit.....	97	366 Brunswick-Balke-Collender Company Folding Partitions.....	125
347 American Floor Surfacing Machine Co. Floor Maintenance.....	173	357 Barber-Colman Company School Wardrobe.....	186	367 Brunswick-Balke-Collender Company School Furniture.....	211
348 American Seating Company School Seating.....	facing page 17	358 Bausick Company Casters.....	180	368 Burroughs Corporation Cash Register.....	11

## USE THESE CARDS

(We pay the postage)



*These cards are detachable and are provided for the convenience of our subscribers, and those to whom they pass their copies, in obtaining information on products and services advertised in this issue or described in the "What's New" Section. See reverse side.*

FIRST CLASS  
PERMIT NO. 136  
SEC. 34.9 P. L. & R.  
CHICAGO, ILL.

BUSINESS REPLY CARD  
No Postage Stamp Necessary if Mailed in the United States

3 CENT POSTAGE WILL BE PAID BY

**THE NATION'S SCHOOLS**

919 NORTH MICHIGAN AVENUE

CHICAGO 11, ILLINOIS



FIRST CLASS  
PERMIT NO. 136  
SEC. 34.9 P. L. & R.  
CHICAGO, ILL.

BUSINESS REPLY CARD  
No Postage Stamp Necessary if Mailed in the United States

3 CENT POSTAGE WILL BE PAID BY

**THE NATION'S SCHOOLS**

919 NORTH MICHIGAN AVENUE

CHICAGO 11, ILLINOIS





# Index to Products Advertised—Continued

Key	Page	Key	Page	Key	Page
369 Caliform Corporation		419 Hauserman Company, E. F.		476 Nissen Trampoline Company	
Teaching Aid	214	Movable Interiors	159	Trampolines	33
370 Celotex Corporation		420 Helar Company, H. I.		471 Norris Dispensers, Inc.	
Acoustical Material	5	Institutional Food	following page 32	Milk Dispensers	175
371 Central Scientific Company		421 Herrick Refrigerator Company		472 Nystrom & Company, A. J.	
Science Department Pamphlets	138	Refrigerator	following page 16	Teaching Aids	153
372 Certified Equipment Manufacturers		422 Heywood-Wakefield Company		473 Owens Illinois: Kimble Glass	
Ballasts	Cover 2	School Furniture	178	Company Subsidiary	121
373 Chicago Hardware Foundry Company		423 Hild Floor Machine Company, Inc.		Glass Block	121
Tables & Stool Bases	180	Floor Maintenance	176	474 Owens Illinois: Libbey Glass	
374 Claridge Products & Equipment Co.		Hillyard Chemical Company		Glassware	189
Chalkboards	210	Floor Maintenance	151	475 Page Fence Association	
375 Clarke Sanding Machine Company		425 Hobart Mfg. Company		Wire Fence	158
Floor Maintenance	2	Kitchen Machines	103	476 Peabody Seating Company	
376 Coffey Company, Jack C.		426 Holcomb & Hoke Manufacturing		School Seating	30
Film Storage Unit	164	Company, Inc.		477 Peterson & Company, Leonard	
377 Compton & Company, F. E.		Folding Doors	169	Laboratory Furniture	188
Encyclopedia	Cover 3	427 Holcomb Mfg. Company, J. I.		478 Pittsburgh Corning Corporation	
378 Coan Organ Corp.		Maintenance Products	215	Glass Blocks	132, 133
Organs	218	428 Howe Folding Furniture, Inc.		479 Pittsburgh-Des Moines Steel Company	
379 Connor Lumber & Land Company		Folding Tables	194	Grandstands	177
Maple Flooring	180	429 Hunt Pen Company, C. Howard		480 Pittsburgh Plate Glass Company	
380 Corning Glass Works		Pencil Sharpeners	200	Paint	following page 16
Dinnerware	174	430 Huntington Laboratories, Inc.		481 Pittsburgh Reflector Company	
381 Cram Company Inc., George F.		Floor Maintenance	113	School Lighting	152
Teaching Aids	204	431 Illuminating Engineering Company		482 Playtime Equipment Corporation	
382 Crow Electric-Craft		School Lighting	160	Bleachers	142
Electrical Shop Counseling Service	22	432 International Business Machines		483 Powers Regulator Company	
383 Curtis Lighting, Inc.		Corporation		Thermostatic Shower Valve	22, 23, 24
School Lighting	88	Electric Typewriters	207	484 Radiant Mfg. Corporation	
384 Cyclone Fence Dept., American Steel		433 International School Seating		Audio Visual Aids	135
& Wire Div. U. S. Steel Corp.		Division of Union City Body Co., Inc.		485 Rauland-Borg Corporation	
Wire Fence	190	School Seating	112	Intercommunication System	186
385 Dage Television		434 Irwin Seating Company		486 Remington Rand Inc.	
Teaching Aid	212	School Seating	196	School Record File	155
386 Daintee Toys Inc.		435 Johns-Manville		487 Richards-Wilcox Mfg. Company	
Counting Frame	198	Floor Covering	197	Aluminum Partitions	181
387 Day-Brite Lighting, Inc.		436 Johnson Plastic Tops, Inc.		488 Rowles Company, E. W. A.	
School Lighting	173	Table Tops	206	Aluminum Chalkboard Trim	134
388 Dettra Flag Company, Inc.		437 Johnson Service Company		489 Royal McBee Corporation	
Flags	206	Temperature Control	20, 21	Typewriter	131
389 Ditto, Inc.		438 Kentile, Inc.		490 St. Charles Mfg. Company	
Duplicator	183	Floor Covering	203	Booklet	128
390 Dodge Division		439 Kewanee Boiler Division		491 St. Regis Paper Company	
School Bus Chassis	217	Boilers	201	Surfacing Material	116, 117
391 Dodge Company, C. B.		440 Kewanee Industrial Washer Corp.		492 Schieber Sales Company	
Floor Maintenance	198	Dishwasher	178	Folding Tables & Bench Unit	40
392 Don & Company, Edward		441 Kewanee Mfg. Company		493 Sexton & Company, John	
Institutional Equipment	208	Laboratory Furniture	181	Institutional Food	101
393 Draper Shade Company, Luther O.		442 Klopp Engineering, Inc.		494 Sheldon Equipment Company, E. H.	
Visual Education Blinds	218	Coin Counter	102	Laboratory Furniture	106
394 Dudley Lock Corporation		443 Kohler Company		495 Sheldon Machine Co., Inc.	
Locks	95	Plumbing Fixtures	168	Machine Shop Equipment	148
395 Dunham-Bush, Inc.		444 Libbey-Owens-Ford Glass Company		496 Sjöstrom Company, Inc., John E.	
Heating & Cooling Products	115	Window Glass	193	Library Furniture	144
396 Duplex Straw Dispenser Company		445 Logan Engineering Company		497 Sloan Valve Company	
Straw Dispenser	208	Machine Shop Equipment	15	Flush Valves	1
397 Du Pont de Nemours & Co., Inc., E. I.		446 Markin Venetian Blind Company		498 Smithcraft Lighting Division	
Floor Maintenance	9	Visual Education Blinds	124	School Lighting	149
398 Duracote Corporation		447 Manley, Inc.		499 Spencer Turbine Company	
Fiberglass Fabrics	98	Refreshment Equipment	129	Floor Maintenance	199
399 Eastman Kodak Company		448 Maple Flooring Mfrs. Assn.		500 Sphinx Chair Glide Company	
Projector	147	Maple Flooring	195	Chair Glide	206
400 Economics Laboratory, Inc.		449 Master Lock Company		501 Stacor Equipment Company	
Dishwashing Products	127	Locks	130	Drawing Table	199
401 Electro-Silv-A-King Corporation		450 Mastie Tile Corporation of America		502 Steril-Sil Company	
School Lighting Catalog	150	Floor Covering	31	Silver Handling System	143
402 Electro-Voice, Inc.		451 Medart Products, Inc., Fred		503 Stran-Steel Corporation	
Public Address Speaker	156	Scoreboards	91	Structural Systems	163
403 Executone, Inc.		452 Melerjohan-Wengler		504 Straubel Paper Company	
Intercommunication System	139	Tablets & Lighting Fixtures	150	Towels & Tissues	123
404 Federal Telephone and Radio Company		453 Minneapolis-Honeywell Regulator Co.		505 Stromberg Time Corporation	
Telephone System	188	Temperature Control	26, 27	Clock & Program System	146
405 Fenestra Incorporated		454 Mississippi Glass Company		506 Thonet Industries, Inc.	
Door-Frame-Hardware Units	157	Diffusing Glass	17	School Furniture	182
406 Field Enterprises, Inc.		455 Mitchell Mfg. Company		507 Tile-Tex Division	
Encyclopedia	93	Folding Tables	140	Floor Covering	191
407 Fleetwood Furniture Corporation		456 Monroe Company		508 Toastmaster Products Div. of	
School Furniture	158	Folding Tables	164	McGraw Electric Company	
408 Ford Motor Company		457 Montgomery Mfg. Company		Food Service Equipment	143
School Bus Chassis	29	Program Clocks	168	509 Trane Company	
409 General Electric Company		458 Moore Company, E. R.		Unit Ventilator	108, 109
Projection Lamp	126	Choral Robes	210	510 Underwood Corporation	
410 Geneva Modern Kitchens		459 Mutschler Brothers Company		Electric Typewriter	13
Homemaking Classroom		School Furniture	137	511 U. S. Plywood	
Equipment	104	460 Muden & Sons		Chalkboard	136
411 Gold Seal Division, Congoleum-		Scoreboards	178	512 Universal Bleacher Company	
Nairn, Inc.		461 National Cash Register Company		Gymnasium Capacity Calculator	119
Floors & Walls	170	Accounting Machines	167	513 Vestal, Inc.	
412 Griggs Equipment, Inc.		462 National Carnes Works		Floor Maintenance	32
School Seating	203	Electric Food Carts	192	514 Victor Animatograph Corporation	
413 Grollier Society Inc.		463 National Electrical Manufacturers Assn.		Audio Visual Aids	205
Encyclopedia	187	Freezer Teaching Kit	105	515 Vogel-Peterson Company	
414 Gumpert Company, Inc., B.		464 National Gypsum Company		Coat & Hat Racks	184
Institutional Food	Cover 4	Acoustical Material	198	516 Weber Costello Company	
415 Guth Company, Edwin P.		465 National Lock Company		Art Materials	150
School Lighting	19	Locks	168	517 Westinghouse Electric Corporation	
416 Hamilton Mfg. Company		466 National School Furniture Company		Electrical Equipment	35, 36, 37
School Furniture	216	Classroom Cabinets	213	518 Williams & Brower, Inc.	
417 Hampden Specialty Products, Inc.		467 National Super Service Company		School Furniture	208
School Seating	192	Floor Maintenance	8	519 Yale & Towne Mfg. Company	
418 Hardwood Products Corporation		468 Neubauer Mfg. Company		Locks	38, 39
Sound Insulating Doors	214	Basket Rack	199	520 Yanco Manufacturing Company	
		469 New Castle Products, Inc.		Lawn Mower	123
		Folding Doors	165	521 Young Company, Paul O.	
				Piano Carrier	178



**YOURS FOR THE ASKING...**

# 82 ideas for using "COMPTON'S" as a classroom tool

PART of Mr. Caplin's job, as a science teacher, is to help children use the methods of science to solve problems. This requires a clear statement of the problem, search for factual data, testing of data, and finally arriving at a reasonable conclusion.

The question, "Can there be living things anywhere but on the earth?" came up in an astronomy lesson. "Let's be real scientists," said Mr. Caplin, "and see if we can find the facts which will help us answer the question."

The first question to be answered was "What are living things?" The article *Life in the classroom's* COMPTON'S helped the class decide.

The next was, "What do living things need to stay alive?" Discussion brought these out as air, proper temperature, water, food—in that order. The need for each was recognized and confirmed in COMPTON'S *Biology* article.



**THE INSIDE OF THE EARTH** is red-hot. Geologists believe it looks something like this. Page 16 of the Service Book tells ways to build classroom activities around "Pictures That Teach" like this one from COMPTON'S.

Next Mr. Caplin suggested that committees find out the conditions on the moon, planets, stars. Each committee turned to the proper volume in COMPTON'S. Then the information was organized in chart form. The class was thus quickly able to answer Yes, No, or Maybe—as it applied to each body.

## COMPTON'S Creative Role in the Classroom

This is one of many interesting ways COMPTON'S plays a creative role in modern classrooms. It goes far beyond merely providing facts in an enjoyable way. It is the basis for many different kinds of rewarding classroom adventure. And it offers rich opportunities to develop basic skills in Science, Social Studies, and Language Arts.

To help teachers get the full value from their classroom encyclopedia, we have developed a new professional service. A Service Book of 82 ways to benefit from COMPTON'S in the classroom has been compiled and tested by teachers. Each of its 82 suggestions is presented in narrative form. (Mr. Caplin's way of Teaching the Scientific Method of Problem Solving, described above, is a typical example.)

This Service Book is called "COMPTON'S AT WORK IN THE CLASSROOM." Here is a glimpse of just a very few of the activities it describes:

**I. DEVELOPING SCIENCE SKILLS.** Helping Children Make Accurate Observations . . . Suspending Judgment Until All Facts Are In . . . Learning to Collect, Organize, Classify, Identify.



**II. DEVELOPING SOCIAL STUDIES SKILL.** Introducing Maps in the Primary Grades . . . Using Geographical Terms . . . Reading and Making Graphs.

**III. DEVELOPING LANGUAGE ARTS SKILLS.** Developing Reading Interest . . . Paraphrasing; Summarizing . . . Learning to Outline.

**IV. PROVIDING FOR CLASSROOM ENRICHMENT.** Teaching a Unit on Farms and Farm Life . . . Integrating Science, Social Studies.

**V. HELPING TEACHERS WITH SPECIAL PROBLEMS.** Organizing a Nature Exhibit . . . Interpreting the Elementary-School Program to Parents . . . Helping the Bright Child Who Finishes First; the Slow Learner.

**VI. USING COMPTON'S REFERENCE FEATURES.** The Fact-Index . . . Reference-Outlines . . . Bibliographies.

WOULD YOU LIKE a copy of this valuable new Service Book? It is yours free. Naturally it is of greatest value to those teachers who have COMPTON'S in their classrooms, because some of the activities are built around exclusive COMPTON materials and features. But teachers who have tested this book tell us that the activities are so creative that they are very helpful when used with any good up-to-date school encyclopedia. For your free copy, simply mail coupon below.



**EXCELLENT OPPORTUNITIES** for teachers and principals interested in a pleasant and financially rewarding part-time educational career as a Compton representative—through rendering to children a worthwhile service which every home needs and can easily afford. Special plan provides for rapid promotion to sales manager positions. For full information, write our Mr. Ray M. Johnson, Vice President.



# COMPTON'S *Pictured* ENCYCLOPEDIA

F. E. COMPTON & COMPANY, Compton Building, Chicago 10, Illinois

F. E. COMPTON & COMPANY, Dept. NS-10,  
Compton Building, Chicago 10, Illinois

Please send me free and without any obligation a copy of your new Service Book for teachers, "Compton's at Work in the Classroom."

Name..... Position.....

School .....

Address .....



# CONTROL

## IS NO ACCIDENT

The puppeteer spends years developing the skills that give him control over the puppets' movements. In the same way, Gumpert has devoted years to developing fine Food Specialties that give restaurant management vital controls.

When you use Gumpert products, you know in advance exactly how many portions you'll get and how much each costs. There's no guesswork involved. You're also sure of uniform, exceptionally fine quality. Besides that, you eliminate waste, save time and labor.

With these tried-and-true Gumpert controls working for you, you'll find your customers more satisfied, your profits greater. Your Gumpert representative will be glad to tell you more about the benefits you'll gain by Going Gumpert.



FIRST NAME IN FINE FOOD SPECIALTIES  
**300** TESTED PRODUCTS THAT MAKE FOOD SELL

S. GUMPERT CO., INC., JERSEY CITY 2, NEW JERSEY  
CHICAGO • SAN FRANCISCO • HOUSTON